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ABSTRACT

This international directory of existing information systems and services on ongoing research includes descriptions of planned systems and services, those under development, and those which are fully operational, as well as several institutional initiatives which represent innovative approaches to the field. Data collection for the inventory was organized through the UNISIST Programme of the United Nations Educational, Scientific and Cultural Organization (UNESCO) and the Smithsonian Science Information Exchange (SSIE). The directory is organized in three principal parts. In the first part a narrative overview combines an examination of the contents of the inventory with a selective review of the available literature on the state of the art. The second part contains profiles of the individual systems and services identified as a result of the UNISIST/SSIE data collection. The final part consists of four indexes to the system and service profiles: (1) organization and system names; (2) acronyms; (3) names of individuals responsible; and (4) subject areas covered. (Author/CWM)

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Information Services on Research in Progress

A Worldwide Inventory

Services d'information concernant les recherches en cours

Répertoire mondial

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Information Services on Research in Progress

A Worldwide Inventory

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Répertoire mondial

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Foreword

The information transfer process is increasingly recognized by the international community as a pivotal factor in social and economic development—an essential link between the generation of knowledge through research and innovation and the application of such knowledge for the betterment of society. In keeping with this recognition, the traditional concept of the information function as one of maintenance of passive depositories of knowledge has evolved into the modern concept of active information systems organized at the national and international levels to serve needs for specialized information of all types.

The United Nations and its specialized agencies have strived to perform a major role in the organization of information transfer, through developmental assistance to national information systems and promotion of international cooperation in the information field, as initially exemplified by international bibliographic information networks such as AGRIS and INIS. Unesco has been privileged to have a unique function in this process as the only agency with a vocation for the science of information as such—comprising the development of information, documentation, library, and archival systems—as well as for the promotion of specialized information services in the fields of education, science, and culture. It is in this context that the programme of UNISIST—a loose network enlisting the voluntary cooperation of all the world's information systems, within a conceptual and normative framework accepted by all—was first promulgated as an intergovernmental programme of Unesco in the fields of scientific and technological information, and is now being pursued as a framework for information transfer in all fields of knowledge, through the sponsorship of the Unesco General Information Programme.

Despite the considerable successes of international cooperation in facilitating world exchange of published information, it has become evident in recent years that new approaches to information transfer still have to be developed to permit optimum utilization of the world's information resources.

A special urgency was given to this problem in 1974 when the United Nations General Assembly adopted a declaration on the establishment of a New International Economic Order, which was followed by a series of resolutions aiming to help make the achievements of modern science and technology available to the developing countries. Specifically, Resolutions 3362 (S-VII) and 3507 (XXX) stressed the need for exchange of research findings relevant to the developing countries and for facilitation of access by developing countries to information on technologies suited to their specific needs, through the ultimate establishment of a global technological information network.

It was in the spirit of such new approaches and needs that Unesco sponsored in 1975, in conjunction with the Smithsonian Science Information Exchange, an International Symposium on Information Systems and Services in Ongoing Research in Science, a meeting which brought together for the first time specialists from both developing and developed countries to discuss techniques for treatment of information covering research projects in progress. Although application of these new techniques at the national level and in cooperation at the international level involves certain difficulties, the symposium was marked by a wide consensus and enthusiasm for development of information systems on ongoing research as a tool for policymaking and research management and as a means for making preliminary information available to researchers prior to formal publication of results.

Of the many ideas which emerged from this meeting, one which attracted almost universal acceptance was the need for an international directory of existing information systems and services on ongoing research, as an aid to development of individual systems and as a significant step in international cooperation. The participation of Unesco in the preparation of such a directory was approved in the context of the Organization's programme for 1976, following the generous commitment of the Smithsonian Science Information Exchange and the National Science Foundation of the United States to provide the bulk of the technical and financial support for such a document. In order to ensure the relevance and worldwide coverage of the directory, a major responsibility for the data collection effort and for international review of its contents has been assumed by the Unesco secretariat, in consultation with the concerned organizations of the United Nations system. An international consultative group of experts, established in terms of the approved programme and budget of Unesco for 1977–78, has served as an Editorial Advisory Board.

The Preface by Dr. Hersey clearly and concisely reviews the steps in the compilation effort and the contents of the directory itself, which identifies ongoing research information resources in all fields and all geographic regions for present or future referral (it should be remembered that some of these resources are not available for general consultation at the present time) and provides, as well, an overview of trends and techniques in handling ongoing research information which should be of interest to specialists throughout the world.

One qualifying remark is in order, however, to justify the considerable heterogeneity in the size and state of development of the services covered by the directory, which in fact results as much from the rapid development of the field of ongoing research information itself as from a conscious effort on the part of the sponsors to include the maximum number of potential resources. Reader opinion on the usefulness of the directory is sincerely invited, as well as any corrections to the text or contributions from services which are not listed. In this way it is hoped that improvement may be brought to expected future editions.

Unesco is pleased to have been able to contribute to this endeavour in international cooperation, the results of which are recorded on the following pages.

Adam Wysocki
Director, Division of the
General Information Programme
United Nations Educational, Scientific
and Cultural Organization

Avant-Propos

La communauté internationale voit de plus en plus dans le transfert de l'information un pivot du développement social et économique – un lien indispensable entre la genèse de la connaissance par la recherche et l'innovation et l'application de cette connaissance au progrès de la société. Parallèlement, la conception de l'information a changé. Sa fonction traditionnelle de dépositaire passif du savoir a fait place à la notion moderne de système actif organisé à l'échelon national et international pour répondre aux besoins d'informations spécialisées de toute nature.

L'Organisation des Nations Unies et ses institutions spécialisées se sont efforcées de jouer un rôle majeur dans l'organisation du transfert de l'information, en contribuant au développement des systèmes nationaux d'information et en favorisant la coopération internationale dans le domaine de l'information, comme en témoigne à un premier stade l'implantation de réseaux bibliographiques tels que AGRIS et INIS. L'Unesco a eu le privilège de jouer un rôle unique dans ce processus, étant la seule institution du système des Nations Unies dont la vocation soit de s'occuper de la science de l'information en tant que telle-tâche qui implique le développement des services d'information, de documentation, de bibliothèques et d'archives – ainsi que d'encourager les services d'information spécialisée dans les domaines de l'éducation, de la science et de la culture. C'est ainsi que le programme UNISIST – réseau souple fondé sur la coopération volontaire de tous les systèmes d'information du monde dans un cadre conceptuel et normatif accepté par tous – a d'abord été lancé en tant que programme intergouvernemental de l'Unesco en matière d'information scientifique et technologique, et sert désormais de cadre au transfert de l'information dans tous les domaines de la connaissance, au titre du Programme général d'information de l'Unesco.

Si la coopération internationale a indéniablement permis de faciliter l'échange mondial d'informations publiées, il est cependant devenu évident, ces dernières années, qu'il faudrait définir de nouvelles formules de transfert de l'information afin de pouvoir utiliser au mieux les ressources mondiales en matière d'information.

Cette question a pris un caractère d'urgence tout particulier en 1974, lorsque l'Assemblée générale des Nations Unies a adopté une déclaration sur l'instauration d'un Nouvel ordre économique international, suivie d'une série de résolutions visant à contribuer à mettre à la disposition des pays en développement les résultats obtenus par la science et la technologie modernes. Plus précisément les résolutions 3362 (S-VII) et 3507 (XXX) ont souligné la nécessité de partager les résultats de recherches intéressant les pays en développement et de faciliter l'accès des pays en développement aux renseignements concernant des technologies adaptées à leurs besoins spécifiques, grâce à la mise en place d'un réseau mondial d'échange de renseignements techniques.

C'est en ayant à l'esprit ces nouvelles approches et ces nouveaux besoins que l'Unesco a organisé en 1975, en collaboration avec le Smithsonian Science Information Exchange, *un colloque de l'UNISIST sur les systèmes et services d'information concernant les recherches scientifiques en cours, qui réunissait pour la première fois des spécialistes de pays en développement et de pays développés pour leur permettre d'examiner les techniques de traitement de l'information relative aux projets de recherches en cours. L'application de ces nouvelles techniques à l'échelon national et en vue d'une coopération internationale soulève certaines difficultés, mais ce qui a marqué le colloque, c'est un large consensus et un sentiment d'enthousiasme en faveur de la mise au point de systèmes d'information sur les recherches en cours qui serviraient d'instruments pour l'élaboration des politiques et la gestion de la recherche, et contribueraient à mettre à la disposition des chercheurs des données préliminaires avant la publication officielle des résultats des recherches.*

Parmi les nombreuses idées émises lors de cette réunion, il en est une qui a recueilli un assentiment quasi-général : c'est la nécessité d'établir un répertoire mondial des systèmes et services d'information existants sur les recherches en cours; un tel répertoire faciliterait en effet la mise en place des différents systèmes et représenterait un progrès important dans la coopération internationale. La participation de l'Unesco à l'élaboration de ce répertoire a été approuvée au titre du programme de l'Organisation pour 1976, le Smithsonian Science Information Exchange *et la* National Science Foundation *des Etats-Unis s'étant généreusement engagés à fournir l'essentiel de l'appui technique et financier nécessaire. Pour assurer la pertinence et la portée mondiale du répertoire, la responsabilité de la collecte des données et de l'examen international du contenu a été assumée au premier chef par le Secrétariat de l'Unesco en consultation avec les organisations intéressées du système des Nations Unies. Un groupe consultatif international d'experts, créé en exécution du programme et budget approuvé de l'Unesco pour 1977-1978, a joué le rôle de comité consultatif de rédaction.*

Dans sa préface, M. Hersey présente de façon claire et concise les différentes étapes du travail de compilation et le contenu du répertoire proprement dit qui identifie dans tous les domaines et dans toutes les régions géographiques les sources d'information qui peuvent être consultées dès maintenant ou pourront l'être dans l'avenir (certaines de ces sources, en effet, ne sont pas encore accessibles au public), tout en donnant une vue d'ensemble des tendances et des techniques du traitement de l'information relative aux recherches en cours, qui devrait offrir un intérêt pour les spécialistes du monde entier.

Il convient toutefois d'apporter une précision pour expliquer la grande hétérogénéité des services recensés dans le répertoire, du point de vue tant de leur dimension que de leur degré de développement : cette hétérogénéité résulte en effet autant de l'évolution rapide dans le domaine de l'information relative aux recherches en cours que d'un effort conscient des auteurs pour inclure dans l'inventaire le maximum de ressources potentielles. Le lecteur est sincèrement invité à faire connaître son opinion sur l'utilité du répertoire, ainsi qu'à présenter toute rectification qu'appellerait le texte ou tous renseignements concernant des services non mentionnés dans le répertoire. Ainsi espère-t-on améliorer des éditions ultérieures du répertoire.

L'Unesco est heureuse d'avoir pu contribuer à cet effort de coopération internationale, dont les résultats sont présentés ci-après.

Adam Wysocki
Directeur de la Division du programme général d'information
Organisation des Nations Unies pour l'éducation, la science et la culture

Preface

In October 1975, the UNISIST Programme of Unesco, in cooperation with the Smithsonian Science Information Exchange (SSIE), organized and sponsored an International Symposium on Information Systems and Services in Ongoing Research in Science. This meeting brought together for the first time nearly 200 persons engaged in various aspects of the field of ongoing research information. It provided a needed and welcome forum for discussion of current and future user needs, identification of common problems among existing and emerging systems, and exchanges of views regarding opportunities for improved international cooperation in the field. Participation involved individuals from all parts of the world, including a large number from developing countries.

There emerged from this meeting the general consensus that, within the conceptual framework of the UNISIST Programme, appropriate initiatives might be undertaken which could lead toward improved international coordination, both in the development of information systems for ongoing research and in the transfer of ongoing research information. This consensus was reflected in thoughtful summary comments offered by Miss D. E. Torrijos of the Philippine National Science Development Board, as well as in the concluding remarks made by Dr. Adam Wysocki, then Director of the Division of Scientific and Technological Documentation and Information and now Director of the Division of the General Information Programme of Unesco. One of the specific recommendations for immediate action put forth by several participants, including Professor E. de Grolier of the International Social Sciences Council, was the compilation and publication of this worldwide inventory of ongoing research information systems and services.

The inventory was made possible through close cooperation among UNISIST, SSIE, the Division of Science Information of the U.S. National Science Foundation (NSF), and, above all, the many organizations around the world which responded to the inventory data collection effort. Planning for this effort took place at Unesco House in Paris in the summer of 1976 and resulted in the printing and distribution of the UNISIST/SSIE inventory questionnaire (see Appendix) between December 1976 and August 1977. Data collection in Unesco Member States was undertaken by UNISIST, with the exception of the United States and Canada, where a similar effort was conducted by SSIE. Questionnaires were sent to all known systems and services, including those represented by participants in the symposium, as well as to UNISIST National Committees and established national information focal points.

The scope of the inventory was designed to provide for the inclusion of a broad range of systems and services for the processing of information on research projects in progress. It thus reflects both the emerging nature of the field and the diverse character of the organizations active within it. Descriptions of planned systems and services, those under development, and those which are fully operational are included, as are several institutional initiatives which represent innovative approaches to the field. Systems dealing solely with bibliographic documentation and services restricted to in-house applications within a single institution fall outside the scope of the inventory and are not included.

This initial—and, of necessity, somewhat preliminary—edition of *Information Services on Research in Progress* is organized in three principal parts. In the first part a narrative overview is presented which combines an examination of the contents of the inventory with a selective review of the available literature on the state of the art. The second part contains the inventory itself, in the form of profiles of the individual systems and services identified as a result of the UNISIST/SSIE data collection effort. The final part consists of four indexes to the system and service profiles: organization and system names; acronyms; names of individuals responsible; and subject areas covered.

The inventory represents yet another significant step by UNISIST (and another to which SSIE, with the support and encouragement of NSF, has had an opportunity to contribute) toward improved international cooperation in the field of ongoing research information. In addition to the symposium and the inventory compilation efforts:

- *UNISIST Guidelines on the Conduct of a National Inventory of Current Research and Development Projects* (Paris: Unesco, SC/75/WS/13, 49 pp.) were published in March 1975 as the result of a study by Mr. Peretz Wollman;
- the proceedings of the symposium were published in the fall of 1976 under the title: *UNISIST International Symposium on Information Systems and Services in Ongoing Research in Science: Proceedings* (Budapest: Hungarian Central Technical Library and Documentation Centre, 1976, ISBN 963 592 062 8, 469 pp.); and
- the first meeting of the UNISIST International Consultation on Ongoing Research Information Systems and Services was held in Paris in October 1977, in order to elaborate a long-term program in the field.

Collectively, these steps have contributed to an increasing recognition of the importance of information on research in progress to a broadly based community of users. It is to be hoped that they might also serve as a basis, not only for more concerted action toward the development of ongoing research information resources at the national, regional, and international levels, but for the establishment, as well, of more formal international mechanisms through which these actions might be encouraged.

David F. Hersey, Ph. D.
President
Smithsonian Science Information Exchange
Washington, D.C., U.S.A.

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Préface

En octobre 1975, l'Unesco a organisé, au titre de son programme UNISIST, et, en collaboration avec le Smithsonian Science Information Exchange (SSIE), *un Colloque international sur les systèmes et services d'information concernant les recherches scientifiques en cours, qui a réuni pour la première fois près de 200 personnes engagées, à titres divers, dans le domaine de l'information sur les recherches en cours. Ce colloque a donné lieu à un forum utile et généralement souhaité, qui a permis de discuter des besoins actuels et futurs des utilisateurs, ainsi que des problèmes communs aux systèmes qui existent déjà et à ceux qui sont en train de se développer, et d'échanger des opinions sur les possibilités d'améliorer la coopération internationale dans ce domaine. Les participants venaient de toutes les parties du monde dont un grand nombre de pays en développement.*

De cette réunion il s'est dégagé le sentiment général que, dans le cadre conceptuel du programme UNISIST, pourraient être prises des initiatives propres à conduire à une amélioration de la coordination internationale en ce qui concerne le développement des systèmes d'information sur les recherches en cours et le transfert des informations dans ce domaine. Ce consensus s'est traduit dans les commentaires raisonnés présentés en résumé par Mlle D.E. Torrijos, du Philippine National Science Development Board, *et dans les conclusions formulées par M. A. Wysocki, alors Directeur de la Division de la Documentation et de l'Information Scientifiques et Technologiques, actuellement Directeur de la Division du Programme Général d'Information de l'Unesco. L'une des mesures immédiates recommandées expressément par plusieurs participants, notamment par M. E. de Grolier, du Conseil International des Sciences Sociales, consistait à entreprendre la compilation et la publication du présent répertoire mondial des systèmes et services d'information concernant les recherches en cours.*

Ce répertoire a pu être établi grâce à une étroite coopération entre l'UNISIST, le SSIE et la Division of Science Information *de la* National Science Foundation (NSF) *des Etats-Unis et surtout grâce à la contribution de nombreuses institutions du monde entier qui ont participé à la collecte des données nécessaires. Les travaux de planification qui se sont déroulés à l'Unesco à Paris, pendant l'été 1976, ont permis d'imprimer et de diffuser, entre décembre 1976 et août 1977, le questionnaire UNISIST/SSIE (qui est reproduit en annexe). C'est l'UNISIST qui s'est chargé de la collecte des données dans les Etats Membres de l'Unesco, à l'exception des Etats-Unis et du Canada où cette tâche a été assumée par le SSIE. Des questionnaires ont été adressés à tous les systèmes et services connus, y compris ceux qui avaient envoyé des représentants au colloque ainsi qu'aux Comités Nationaux pour l'UNISIST et aux points de convergence nationaux établis en matière d'information.*

Le répertoire a été conçu de manière à couvrir une large gamme de systèmes et de services de traitement de l'information relative à des projets de recherche en cours. Il reflète ainsi à la fois le caractère d'évolution croissante de ce domaine et la diversité des organismes concernés. On y trouve la description des systèmes et services envisagés, de ceux qui sont en cours de création et de ceux qui fonctionnent déjà. Sont aussi mentionnées plusieurs initiatives institutionnelles qui constituent des innovations dans ce domaine. Les systèmes qui ne traitent que des informations correspondant à une documentation bibliographique et les services à l'usage interne d'une seule institution ne rentrent pas dans le cadre du répertoire et n'y figurent donc pas.

Cette première édition – et évidemment quelque peu préliminaire – de Services d'Information concernant les Recherches en Cours - répertoire mondial, *se compose de trois parties principales. La première présente, sous forme de narratif, un aperçu général du contenu du répertoire allié à une analyse d'un certain nombre d'ouvrages déjà parus sur l'état de la technique. La deuxième partie contient l'inventaire proprement dit sous forme de profils des* *divers systèmes et services identifiés à l'issue du travail de collecte de données entrepris par l'UNISIST/SSIE. La dernière partie se compose de quatre index des profils des systèmes et services : nom de l'organisme, sigle, nom des responsables et domaine d'intérêt.*

Ce répertoire représente une nouvelle initiative importante prise par l'UNISIST, initiative à laquelle le SSIE, avec l'appui et l'encouragement de la NSF, a eu une fois de plus l'occasion de participer en vue d'améliorer la coopération internationale en matière d'information sur les recherches en cours. Outre le Colloque et le travail de compilation que représente le répertoire, il convient de mentionner les activités suivantes :

- Les Principes Directeurs pour l'Etablissement d'un Inventaire National des Projets de Recherches et de Développement en Cours *(Paris, Unesco, SC/75/WS/13, 49 p.) ont été publiés en mars 1975, à la suite d'une étude effectuée par M. Peretz Wollman;*
- *les actes du colloque ont été publiés sous le titre :* UNISIST International Symposium on Information Systems and Services in Ongoing Research in Science: Proceedings *(Budapest, Bibliothèque Technique Centrale et Centre de Documentation Hongrois, 1976, ISBN 963 592 062 8, 469 p.)*
- *la première Consultation internationale de l'UNISIST sur les systèmes et services d'information concernant les recherches en cours s'est tenue à Paris en Octobre 1977, afin d'élaborer un programme à long terme dans ce domaine.*

L'ensemble de ces initiatives ont contribué à une reconnaissance accrue de l'importance de l'information sur les recherches en cours auprès d'une large communauté d'utilisateurs. Il est à souhaiter qu'elles servent également de base non seulement à une action plus concertée en vue du développement des ressources d'information sur les recherches en cours, au niveau national, régional et international, mais encore à l'établissement de mécanismes internationaux plus conventionnels qui favoriseront une telle action.

David F. Hersey, Ph. D.
Président
Smithsonian Science Information Exchange
Washington, D.C. USA

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This inventory was prepared as a cooperative international effort through contributions made by many people in a large number of diverse organizations around the world. Special thanks are due to those too numerous to mention who expended the time and effort to respond to the inventory questionnaire and to verify inventory entries.

Within the General Information Programme of Unesco, the advice of Dr. Adam Wysocki and the day-to-day efforts and assistance of Dr. John B. Rose in coordinating data collection and manuscript review activities were invaluable. The suggestions and contributions of the participants in the International Consultation on Ongoing Research Information Systems and Services—who served as the Editorial Advisory Board and provided a thoroughgoing, professional review of the draft manuscript—are particularly appreciated.

Also acknowledged with great appreciation are the continuing encouragement and interest of Dr. Lee G. Burchinal, Director of NSF's Division of Science Information (DSI), and the valuable assistance and advice of Mr. Eugene Pronko, Director of DSI's National/International Coordination Program. Equally important is the financial support provided by NSF which made possible SSIE's participation in the inventory compilation effort.

Thanks are due as well to Mr. George C. Lilly of the Printing and Publishing Office, U.S. National Academy of Sciences, for his valuable suggestions with respect to entry format and design.

Finally, the extensive contributions made by Miss Sandra Bausinger, Mrs. Althia Kirlew, Miss Judith John, Miss Saundra Morten, Dr. Richard J. Woodman, and Mr. Paul Muniz of SSIE, all of whom provided a broad range of editorial and administrative support services, are gratefully acknowledged. Not the least of these was the mastery of word processing techniques by Miss Bausinger which made possible the economical photocomposition of the manuscript.

Remerciements

Le présent répertoire, qui est le fruit d'un effort de coopération internationale a été établi grâce aux contributions apportées par maintes personnes travaillant auprès de nombreux organismes du monde entier. La liste des personnes qui ont pris le temps et le soin de répondre au questionnaire établi aux fins de l'inventaire et de vérifier les données fournies serait trop longue pour figurer ici : à toutes nous adressons nos remerciements.

Dans le cadre du Programme général d'information de l'Unesco, les avis de M. Adam Wysocki ainsi que les efforts inlassables de M. John B. Rose ont été d'une aide précieuse pour la coordination des travaux de collecte des données et la relecture du manuscrit. Les suggestions et contributions des membres du Groupe consultatif sur les systèmes et services d'information concernant les recherches en cours - qui, en tant que Comité consultatif de rédaction, ont procédé avec une compétence professionnelle à la relecture du manuscrit – ont été particulièrement appréciées.

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World Trends in Information on Research in Progress

An Overview

Tendances mondiales de l'information sur les recherches en cours

Apercu général

by
de
David W. Lakamp and Alfred Pietrzyk
Smithsonian Science Information Exchange

Introduction

The ongoing research information system is unique among scientific and technical information resources, in large part because of the dual nature of the information itself. This information, which may cover research in progress in any of the life, physical, social, or engineering sciences, has a scientific and technical focus on one hand and an administrative focus on the other(56).* Its duality is highlighted in the following suggested definition in which it is characterized as *a standardized set of scientific, technical, and administrative data which describe research projects about to be initiated, actually in progress, or recently completed.* **

The scientific and technical aspect of ongoing research information serves to complement the published literature. It does so by bridging the prepublication information gap which exists between the time a research project is initiated and the time its results become available in published form. The administrative aspect of ongoing research information deals with relevant human, organizational, and economic resources, including the patterned interrelationships which exist among researchers, sources of funding, research institutions, and funding levels. It is this unique combination of characteristics which makes the ongoing research information system a potentially powerful resource, not only for scientists and research managers, but for science policymakers as well(58).

It is also this combination of characteristics which tends to make ongoing research information a particularly suitable resource for development, an advantage which has been stressed by representatives of both developing countries (1,5) and industrialized nations(51,93). Clearly the need for more effective technology transfer and utilization has a crucial bearing on development, and the ongoing research information system would seem to constitute a particularly sensitive response to this need(31).

Within the conceptual framework of Unesco's UNISIST programme, there has been an increasing interest in the ". . . unification of methods and the harmonization of international efforts in the field of transfer of information on ongoing research"(99). The sheer growth of the field in recent years (Fig. 1) is an indication that this interest is not misplaced, and the widespread distribution of ongoing research information activities throughout the world (Fig. 2) suggests that opportunities exist for concrete initiatives toward improvements in international cooperation.

Within the scope of its coverage, the ongoing research information system seeks to answer a series of questions about the current efforts of the research community(63):

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*Numbers in parentheses indicate references cited in the bibliography.
References to system and services profiles are designated by the phrase "cf. Entry X.X," which indicates the sequential location of the referenced inventory entry.

**The difficulty inherent in embracing these three concepts under a single label is reflected in the varying use of "current research information," and "information on research in progress," as alternatives to the term "ongoing research information."
In the present overview, these terms are all assumed to refer to the definition suggested above and are used interchangeably.

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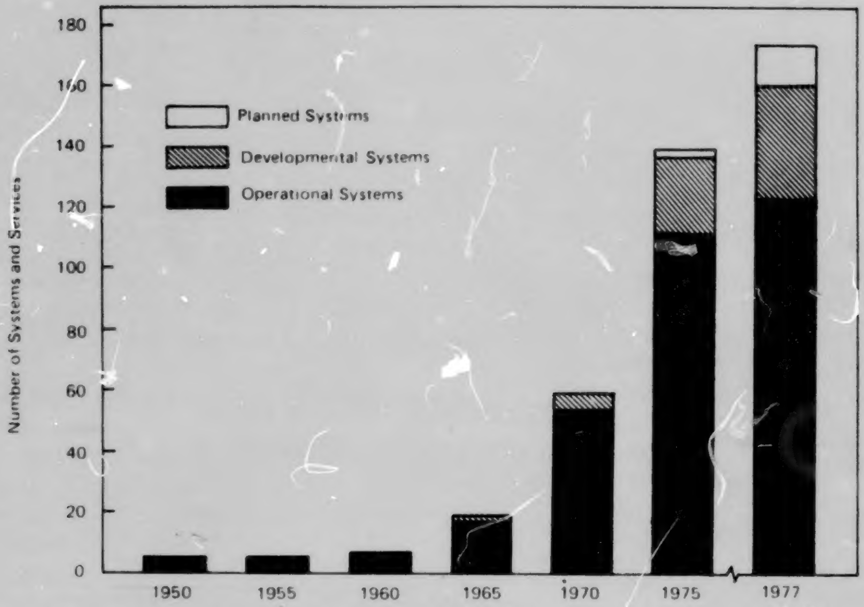

Figure 1. Growth of Ongoing Research Information Activities (excluding six systems, three developmental and three operational, for which data are not available)

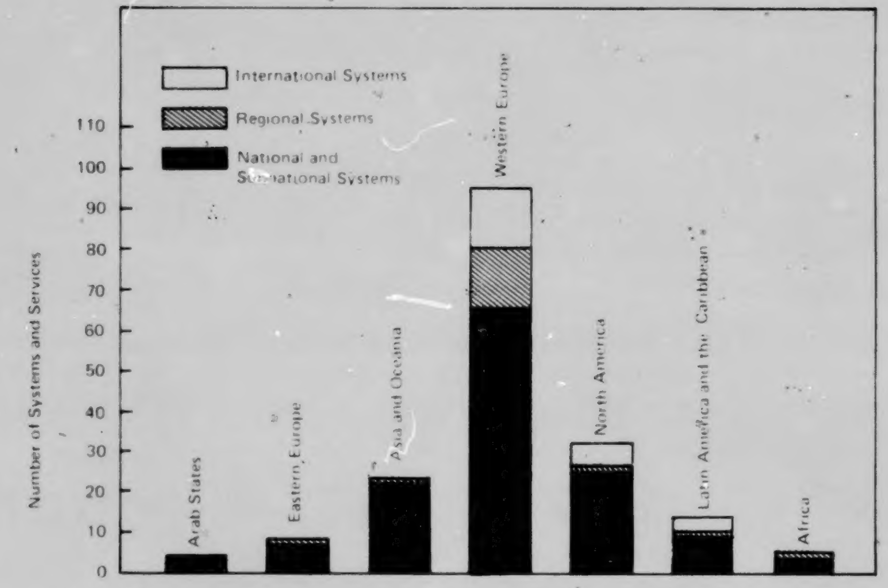

Figure 2. Worldwide Distribution of Ongoing Research Information Systems and Services

- What research is being done?
- Where is the work being carried out?
- Who is performing it?
- How is it being financed?
- When did it start and when is it expected to be completed?
- Which points of contact might provide more detailed information about the research?

In answering these questions, ongoing research information serves to enhance the generation of creative ideas; facilitate the timely sharing of research capabilities, methodologies, and findings; promote cooperation; and help in the avoidance of unwitting and costly duplication of effort. This information can also be compiled into the analytical contexts necessary for the assessment of options for science policymaking, although this application, particularly where large quantities of information are involved, carries with it certain methodological and institutional problems which, in many cases, are yet to be resolved(54).

It is the purpose of this paper to provide a brief overview of current trends in ongoing research information, with an emphasis on the integration of information selected from the present inventory with that in the available literature. Toward this end, the paper is organized to reflect the following aspects of the field:

- Meeting user needs.
- Existing and emerging systems and services.
- Strategies for system design and operation.
- Some long-range issues.

The first section considers the principal types of users, the nature of the information requirements unique to each type, and the problems which have been encountered in responding to these unique information requirements. This includes a preliminary attempt to highlight the value of ongoing research information.

Systems and services are described in terms of national, regional, and international trends as discussed in the literature and derived from the inventory. Comparisons which highlight similarities and differences between systems are made as a means of facilitating future ongoing research information system planning and design efforts.

Strategies for system design and operation are addressed in functional terms. These include input acquisition and cooperative information networking, processing methodologies, selection of key data elements, product and service concepts, and economic aspects of system operation.

In concluding the paper, some of the long-range issues bearing on the field of ongoing research information are discussed. Major opportunities and potential benefits which may result from innovative development and improvements are illustrated for possible future consideration, particularly in the context of national, regional, and international planning.

Introduction

This overview of worldwide activities in ongoing research information systems and services constitutes the first attempt of its kind. It is necessarily selective and illustrative, mainly because of constraints on time and available resources. It is to be hoped, nevertheless, that it will shed some light on alternative prospects for the further development of the field and for the improvement of international cooperation within it. Perhaps, at a minimum, this discussion and the underlying inventory which accompanies it can serve as a baseline against which future progress might be assessed. In this context, some of the more visible conditions which characterize current activities in the field can be summarized as follows:

- The worldwide interest in ongoing research information systems and services is a relatively new phenomenon: more than 50% of the current activities in the field have been initiated within the past five years, and more than 65% have been initiated within the past seven.

- This growth has been accompanied by (and in some cases can be attributed to) an expansion of cooperative networking activities for the regional and international transfer of ongoing research information in specialized subject areas. Most notably, these include coverage of research in the agricultural and social sciences as well as more specific coverage of research in education, road transportation, environment, socioeconomic development, information science, and linguistics.

- Two distinct patterns emerge for the national organization of ongoing research information systems and services. One reflects efforts to provide for coordinated and comprehensive subject and institutional coverage within a single, national system; the other reveals the development of a number of disparate systems at the national level, each designed to provide for specialized subject coverage in a particular scientific or programmatic area of interest.

- Two distinct organizational patterns are also evident with respect to the integration of the ongoing research information system with other information resources, such as those designed for the processing of technical report literature, scientific and technical data, or patent information. Just under 60% of the systems included in the inventory are operated within the context of more encompassing scientific and technical information activities; the balance are operated independently of these resources.

- Input acquisition strategies tend to be based on either an explicit or an implied *quid pro quo*, i.e., the availability of the whole in exchange for the preparation of its parts. This tendency can have major implications with respect to the economics of system operation.

- A broad consensus seems to exist on the desirability of incorporating narrative research project summaries as an integral part of system operations. Among those systems reporting data elements for individual project records, some 69.5% indicated the inclusion of project summary information.

- A majority of the systems and services identified in the inventory employ English as either a primary or a secondary working language (107 of 179 systems or 59.8%). The second most frequently reported carrier language is French which is in use in 38 systems (21.2%).

- Although there is a certain "logical compatibility" among existing systems and services for ongoing research, the absence of unification and standardization of key data elements and data element formats has led to widespread technical incompatibilities. Improving prospects for the transfer of ongoing research information on an international basis requires that these incompatibilities be minimized.

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Meeting User Needs

The dual scientific and administrative focus of ongoing research information noted above is reflected in the two principal categories of users identified in the *UNISIST Guidelines on the Conduct of a National Inventory of Research and Development Projects*(84) and elsewhere (e.g., 5,10,69,74):

- researchers, whose primary applications relate to the process of scientific communication; and
- policymakers, whose primary applications relate to R & D management and administration.

Although these categories are not mutually exclusive for every use to which ongoing research information is put(63), they tend to be helpful in understanding the rather distinct natures a) of the user needs which each category encompasses and b) of the unique system requirements which each category implies.

For the researcher, ongoing research information is of interest, in rather specific subject areas, in terms of the scientific and technical content of individual research projects: variables tested; methodologies employed; theories and models applied to the research problem; interim findings; and so on(40). Traditionally, the "invisible college" has been relied upon by researchers as a source of current information of this kind, but the effectiveness with which the "invisible college" has performed this function has been eroded in recent years(53). Moreover, this informal communications network has never worked particularly well for young researchers newly entering a field(64), nor has it served more experienced scientists whose research has led them into interdisciplinary areas(10). As a result, the ongoing research information system has increasingly been called upon to supplement and enhance the more traditional processes of informal scientific communication(3,33).

By providing a means of access to prepublication information, the ongoing research information system functions as both an information source, in and of itself, and as a referral mechanism to the accumulated knowledge of others. It thus facilitates the cross-fertilization of creative ideas, both indirectly, in the sense that a researcher's knowledge ". . . finds some expression in the descriptions of research projects in which the researcher is engaged"(84), and directly, to the extent that new awareness of the work of others results in the later, personal exchange of what Westrum has called "utilities"(93).

The inherent need, in this context, for information on the scientific and technical details of individual research projects tends to emphasize the importance of the availability of narrative project summaries to the researcher/user of the ongoing research information system(84). The need for access to project summaries in highly specific subject areas further implies a requirement for effective and thorough subject classification of project information for subsequent retrieval(37,47).

For policymakers, research planners, and research managers, the ongoing research information system represents a particularly powerful statistical and analytical resource(17,32,58). The system has the capacity for collecting and storing large quantities of information which, in the aggregate, describe various aspects of the socioeconomic configuration of the R & D community. By starting with administrative data elements at the research project level and providing for consistent subject classification across institutional and disciplinary lines, the ongoing research information system can be used to aggregate data in the wide range of analytical contexts necessary for coordination of research programs, assessment of research trends, and analysis of science policy options(54).

One far reaching, current effort to aggregate research data at the national level is represented by the science indicators concept being developed by the National Science Board (NSB) of the U.S. National Science Foundation. This concept, as illustrated in NSB's report *Science Indicators 1974*(92), has been widely recognized as a pivotal and comprehensive tool for policy analysis. It represents an attempt to draw together, systematically and on a regular basis, statistical information designed to provide a broad perspective on scientific and technical activities in the United States. The principal focus of this effort to date has been on the development of comprehensive measures of science outputs (e.g., publications, journal citations, patents, and so on). Measures of science inputs, on the other hand, such as those represented by the administrative focus of ongoing research information, have thus far been based on broad classifications which tend to reflect the internal, largely idiosyncratic, administrative or programmatic emphases of various reporting organizations. It is in the area of science inputs and their interrelationships with science outputs that ongoing research information has particularly significant potentials for science policy analysis.

Access to ongoing research information by researchers and research managers has also been shown to be essential for the avoidance of unwitting duplication and undesired overlap(34,87). This is an especially important consideration in view of the almost universal need for the most effective possible allocation of scarce resources for research. With respect to the developing countries in particular, such access may well be an "essential endeavor," not only as a means of avoiding wasteful duplication, but of accelerating, as well, the early solution of pressing local research problems(93).

It is for these reasons that ongoing research information has been singled out in the context of scientific and technical information planning as a resource of primary importance for socioeconomic development(4,31,35). In fact, the main emphasis of the 1975 UNISIST Symposium had a developmental thrust. Its first objective was "to expand international understanding of the need for and uses of information on research in progress, with a view to narrowing the gap existing between developed and developing countries"(31). Moreover, the importance of ongoing research information for development has been fully recognized by developing countries, both in terms of the need for comprehensive, indigenous systems(46,48,71), and with respect to the selective availability of information on research in progress from the developed countries(1,5). An information planning approach which combines both aspects could offer significant advantages to countries or regions concerned with information priorities for development. Hersey(35) has suggested, for example, that information services for research in progress might be designed in ways that are:

- especially sensitive to national and regional considerations with respect to technology acquisition;
- highly selective with respect to the socioeconomic impact of external innovations in science and technology;
- usable as a tool in forecasting the confluence of innovative trends in research; and
- suitable as a channel for the prompt communication of ongoing research information within and across priority problem areas.

This suggestion was amplified in the following comments:

> There . . . appears to be a chain of events between the inception of basic and applied research and its ultimate translation into technological applications. Fully developed data bases of ongoing research information generally tend to span this entire range of research and development activity, allowing the opportunity for those engaged in the process to become aware, very early, of developing technological trends. This advance notice can often save developmental costs which might otherwise be incurred(35).

Comprehensive, cross-disciplinary data bases of ongoing research information are also considered to have unique potentials for the complex societal problem-solving applications which are becoming increasingly vital to developed nations(29). These applications typically involve socio-technical systems problems in energy, the environment, and a host of special areas bearing on the quality of life in the emerging post-industrial society. Because of the multidisciplinary, highly unpredictable nature of such problems, comprehensive files of ongoing research information are likely to be used increasingly by those concerned with societal problem solving (e.g., 60,61), including not only policymakers and policy analysts but other potential users as well, many of whom have thus far not requested ongoing research information on a regular basis.

As Samaha suggests, needs for ongoing research information might well be considered to be largely potential, and actions may be called for aimed at developing and stimulating demand(69). A more complete understanding of the specific information requirements inherent in a broad range of uses of ongoing research information may also be needed. Consider, for example, in addition to the research communication and policymaking applications discussed above, the following partial taxonomy of uses variously cited in the literature:

Referral

- Location of sources of expertise for assistance in the solution of a particular research problem.
- Acquisition of leads to the published literature.
- Identification of research centers focusing on research problem areas of particular interest.
- Location of potential sources of support for a new research project in a specific subject area.

Coordination

- Encouragement of cooperative research activities among multidisciplinary programs with compatible research objectives.
- Communication of profiles, on a national and an international basis, of available expertise, research areas of current interest, and research facilities.
- Identification of potential participants for conferences and symposia.

Research

- Detection of trends and shifts in research interests and funding.
- Acquisition of source data for technological forecasting and technology assessment.
- Identification of potential innovations bearing on one's own research.

Meeting User Needs

- Tracking of new and emerging markets for scientific and technical products and services.

Notwithstanding the possibly hypothetical nature of some of these, it is widely believed that the value of the ongoing research information system to its users is directly related to the comprehensiveness of system coverage, the timeliness of the information available, and the quality of the information provided(10,17,38,39). For researchers, the concept of quality generally relates to the scientific accuracy and specificity of the information content of relevant research project records; for policymakers, this concern tends to focus on the reliability and validity of the aggregate data produced by the system in varying analytical contexts. Thus, it is toward the development and maintenance of comprehensive, timely, scientifically accurate, and technically reliable files of ongoing research information that the continuing efforts of system managers tend to be directed, for it is in this way that the broadest possible range of user needs, both actual and potential, can most effectively be met.

Existing and Emerging Systems and Services

Statistical Overview

Identified in the accompanying inventory are 179 planned, pilot, or operational ongoing research information systems and services located in 53 countries around the world. Tables 1 through 4 present the distribution of these systems by Unesco region,* with the European region, for the purposes of this paper, further subdivided into Eastern Europe, North America, and Western Europe. Systems which may be only coincidentally located within a particular region, and which operate without regional affiliation, are identified in the tables separately as "interregional systems." These include systems within the following intergovernmental organizations: the International Centre for Scientific and Technical Information (ICSTI); the Organisation for Economic Co-operation and Development (OECD); the International Federation for Documentation (FID); and agencies of the United Nations.

Table 1 presents a regional distribution of systems in terms of the "countries included" and of the location of "systems represented" in the inventory. Of the 53 countries in which ongoing research information system activities have been identified, four—Ecuador, Kenya, Luxembourg, and Singapore—host regional or international systems only. The remaining 49 countries operate or are developing national ongoing research information resources.

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*Because Unesco's list of regional affiliations provides for the listing of countries within regions ". . . in which the representative character of the States is an important factor," some countries appear under multiple regions. For present purposes, Tunisia and Sudan, which are listed under both Africa and the Arab States, are included among the Arab States. Similarly, the USSR is included within the European region and the Eastern European subregion.

TABLE 1. Countries Included and Systems Represented in the Inventory: Geographic Location of Systems by Unesco Region

Unesco Region	Countries Included		Systems Represented	
	Number	% of Total	Number	% of Total
Africa	5	9.4	5	2.8
Arab States	4	7.6	4	2.2
Asia and Oceania	12	22.6	23	12.8
Europe				
Eastern Europe	6	11.3	6	3.4
North America	2	3.8	32	17.9
Western Europe	16	30.2	88	49.1
Latin America and the Caribbean	8	15.1	13	7.3
Subtotals	53	100.0	171	95.5
Interregional Systems	–	–	8	4.5
Totals	53	100.0	179	100.0

Table 2 presents a regional distribution of systems in terms of the scope of subject coverage reported. Systems identified under the category "broad scope" include those which cover all fields of science and technology, such as the All–Union Centre for Scientific and Technical Information in the Soviet Union (cf. 59 and Entry 47.1) and the Sri Lanka Scientific and Technological Information Centre (cf. 75 and Entry 39.1). Included, as well, are those systems which, although somewhat more selective in scope, nevertheless cover diverse subjects across a broad range of scientific disciplines. Identified under the "specialized" category are systems which deal with less encompassing areas of science and technology—for example, those which cover a single discipline, such as the Permanent Inventory of Agricultural Research Projects (cf. 7 and Entry 2.11) and those which cover a single, albeit interdisciplinary field, such as the Permanent Inventory of Environmental Research (cf. Entry 2.12). Somewhat arbitrarily, systems dealing with research in the social sciences are placed among the specialized systems in this latter group.

Broad scope subject coverage is reported by 31.8% and specialized subject coverage by 68.2% of the systems included in the inventory. The data in Table 2 indicate a heavy emphasis on specialized systems among interregional systems and in the European region, particularly in Western Europe and North America. When these two subregions and the interregional systems are removed from the totals, the percentage of systems reporting subject coverage of broad scope increases from 31.8% to 66.7%.

TABLE 2. System Location and Subject Scope

Unesco Region	Scope of Subject Coverage		Totals
	Broad Scope	Specialized	
Africa	4	1	5
Arab States	3	1	4
Asia and Oceania	13	10	23
Europe			
Eastern Europe	5	1	6
North America	8	24	32
Western Europe	15	73	88
Latin American and the Caribbean	8	5	13
Subtotals	56	115	171
Interregional Systems	1	7	8
Totals	57	122	179

Table 3 presents a regional distribution of systems in terms of their reported stage of development. More than two thirds of the systems (70.4%) report full "operational" status. An additional 23.5% were reported as being in a "developmental" or pilot stage, and the remaining 6.1% were reported as "planned" systems. Within the European region, 96 of 126 systems (76.2%) were reported as fully operational. Outside this region, and excluding interregional systems, emphasis on the development of new systems is indicated by the fact that 21 of 45 systems (46.7%) are either pilot systems or are systems in various stages of planning.

TABLE 3. System Location and Stage of System Development

Unesco Region	Stage of System Development Operational	 Developmental	 Planned	Totals
Africa	2	2	1	5
Arab States	–	4	–	4
Asia and Oceania	15	8	–	23
Europe				
Eastern Europe	4	–	2	6
North America	29	3	–	32
Western Europe	63	18	7	88
Latin America and the Caribbean	7	5	1	13
Subtotals	120	40	11	171
Interregional Systems	6	2	–	8
Totals	126	42	11	179

Table 4 presents a regional distribution of systems in terms of their primary geographic coverage. Included under "international" systems are those which seek worldwide coverage, such as the Current Cancer Research Project Analysis Center (CCRESPAC) (cf. 27 and Entry 1.3), or which otherwise carry out data collection activities on an intercontinental basis. "Regional" systems are those which, although international in nature, seek coverage within countries with common geographic, geopolitical, or cultural interests. The Swedish Council for Forestry and Agricultural Research (cf. Entry 2.19) and the Latin American Council of Schools of Administration (CLADEA) (cf. Entry 2.9) are organizations which operate such systems. "National" systems include those which primarily concentrate on the collection and processing of information on research sponsored or carried out by institutions within a single country. The category "subnational" includes systems which either deal with research carried out at a single institution, such as the Kingston Polytechnic Research Report in the United Kingdom (cf. Entry 48.11), or cover work performed within a limited geographic area within a single country, as does the Canadian Plains Research Center Information System (CANPLAINS) (cf. 13 and Entry 9.3).

TABLE 4. System Location and Geographic Coverage

Unesco Region	Geographic Coverage				Totals
	International	Regional	National	Subnational	
Africa	–	1	4	–	5
Arab States	–	–	4	–	4
Asia and Oceania	–	1	22	–	23
Europe					
Eastern Europe	–	–	6	–	6
North America	6	1	19	6	32
Western Europe	7	15	60	6	88
Latin America and the Caribbean	3	1	8	1	13
Subtotals	16	19	123	13	171
Interregional Systems	8	–	–	–	8
Totals	24	19	123	13	179

National systems account for 68.7% of the total and tend to reflect the broadest distribution among Unesco regions. Of the remaining systems, 24 are international systems (13.4%), 19 are regional (10.6%), and 13 are subnational (7.3%). Broad subject coverage is generally found only in national and subnational systems. Furthermore, as the data in Table 5 indicate, most of the current planning for and development of new systems (83.0%) is being carried out at the national level.

TABLE 5. Geographic Coverage and Stage of System Development

Geographic Coverage	Stage of System Development Operational	Developmental	Planned	Totals
International	20	2	2	24
Regional	15	4	-	19
National	79	35	9	123
Subnational	12	1	-	13
Totals	126	42	11	179

Of the 179 systems included in the inventory, 30 report the processing and storage of project records in two or more languages (see Table 6). International systems account for 10 of these multiple–language systems (33.3%), regional systems for 4 (13.3%), national systems for 14 (46.7%), and subnational systems for 2 (6.7%). English was most frequently reported as one of the languages in use in multiple–language systems (24 of 30 systems), followed closely by French (23 of 30 systems). Other languages reported in use in 3 or more multiple–language systems were: German, 8 systems; Spanish, 5 systems; and Portuguese, 3 systems.

TABLE 6. Working Language and Geographic Coverage

Working Language	Geographic Coverage								Totals	
	International		Regional		National		Subnational			
	(a)	(b)	(a)	(b)	(a)	(b)	(a)	(b)	(a)	(b)
English	12	9	10	4	51	9	10	2	83	24
French	–	9	1	3	14	9	–	2	15	23
German	–	2	2	2	8	4	–	–	10	8
Spanish	1	4	1	1	6	–	–	–	8	5
Dutch	–	–	–	1	6	1	–	–	6	2
Swedish	–	–	1	1	3	–	–	–	4	1
Farsi	–	–	–	–	3	1	–	–	3	1
Japanese	–	–	–	–	3	–	–	–	3	0
Portuguese	–	1	–	–	1	2	1	–	2	3
Russian	1	–	–	–	1	–	–	–	2	0
Other Languages	–	–	–	3	13	5	–	–	13	8
Subtotals	14		15		109		11		149	
Multiple-Language Systems	10		4		14		2		30	
Totals	24		19		123		13		179	

(a) Number of systems reporting record storage in a single language
(b) Number of systems reporting record storage in the language indicated, among one or more other languages

Existing and Emerging Systems and Services

Of 149 systems reporting the use of a single working language, English was reported by 83 (55.7%), French by 15 (10.1%), German by 10 (6.7%), Spanish by 8 (5.4%), Dutch by 6, Swedish by 4, Farsi by 3, Japanese by 3, Portuguese by 2, Russian by 2, and 13 other languages by the remaining 13 systems. Although the data in Table 6 are of some interest with respect to the possible future exchange of ongoing research information among systems, it should be recognized that they tend to obscure the relative importance of languages, such as Russian and the other languages of Eastern Europe, which are used in national systems of broad subject scope and are thus reflected on large numbers of research project records.

National Trends

Table 7 presents a distribution of the 123 national systems included in the inventory by the stage of system development and by the scope of system subject coverage. Systems of broad subject scope are further divided into those which seek "comprehensive institutional coverage" and those which tend to have a "selective institutional focus." Systems falling into this latter group report institutional coverage: a) of research supported by a single, major research funding organization, such as DGRST in France (cf. Entry 14.9); b) of research supported by a single group of similar institutions, such as all private foundations in the United States (cf. Entry 49.7); or c) of research performed by a single group of similar institutions, such as all universities in Canada (cf. 6 and Entry 9.4). National systems with broad scope subject and comprehensive institutional coverage account for 31.7% of the national systems included in the inventory; those with broad scope subject coverage and a selective institutional focus account for 7.3%; and those with specialized subject scope, 61.0%.

TABLE 7. National Systems: System Scope and Stage of System Development

System Scope	Stage of System Development				
	Operational	Developmental	Planned	Totals	Number of Countries
Broad Subject Scope					
Comprehensive Institutional Coverage	22	13	4	39	36
Selective Institutional Focus	8	1	–	9	
Specialized Subject Scope	49	21	5	75	
Totals	79	35	9	123	

Of the 49 countries identified in the inventory as having national systems, 36 either operate, are developing, or are planning some 39 systems with broad scope subject and comprehensive institutional coverage. In the remaining 13 countries, most predominantly among those in Western Europe, ongoing research information activities tend to be concentrated on the planning, development, and operation of systems with specialized subject coverage, focused on single areas of programmatic or scientific interest.

This apparent dichotomy with respect to the national organization of ongoing research information activities emerges as a key consideration for future national, regional, and international planning. Those who favor the development of specialized systems often point toward the advantages inherent in subject classification and retrieval which is particularized in terms of the information needs of a relatively homogeneous group of users (e.g., 27,40). Protagonists of national systems of broad scope point out that, although individual scientists and research managers may be well served by specialized systems, science policymakers require both comprehensiveness of subject and institutional coverage on a national basis(17,56) and consistency of subject classification across programmatic and disciplinary lines(54). This issue would seem to deserve further exploration in appropriate forums, although it should be recognized that the arguments advanced in favor of one point of view or the other are not necessarily mutually exclusive. Several countries, for example, are making systematic efforts to coordinate diverse, national ongoing research information activities through a central institutional mechanism (cf. 41,44, and Entry 31.2).

A more detailed identification of the location of the 39 national systems included in the inventory which seek broad subject scope and comprehensive institutional coverage is presented in Table 8. The European region accounts for 13 of these systems (33.3%), Asia and Oceania also report 13 (33.3%), Latin America and the Caribbean report 7 (18.0%), Africa 4 (10.3%), and the Arab States 2 (5.1%). Of the 17 such systems currently in planning or developmental stages, 14 (82.4%) are located outside the European region, and all 14 of these are located in Member States commonly characterized(86) as developing countries.

TABLE 8. National Systems with Broad Subject Scope and Comprehensive Institutional Coverage: System Location and Stage of System Development

Unesco Region	Stage of System Development			Totals
	Operational	Developmental	Planned	
Africa	1	2	1	4
Arab States	–	2	–	2
Asia and Oceania	8	5	–	13
Europe				
Eastern Europe	4	–	1	5
North America	1	–	–	1
Western Europe	5	–	2	7
Latin America and the Caribbean	3	4	–	7
Totals	22	13	4	39

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By way of comparison, the regional location of the 75 specialized national systems is presented in Table 9. The European region accounts for 64 of these systems (85.3%), Asia and Oceania 9 (12.0%), Latin America and the Caribbean 1 (1.3%), and the Arab States 1 (1.3%). Of the 26 specialized national systems currently in planning or developmental stages, only 5 (19.2%) are located in Member States commonly characterized(86) as developing countries.

TABLE 9. National Systems with Specialized Subject Scope: System Location and Stage of System Development

	Stage of System Development			
Unesco Region	**Operational**	**Developmental**	**Planned**	**Totals**
Africa	–	–	–	0
Arab States	–	1	–	1
Asia and Oceania	6	3	–	9
Europe				
Eastern Europe	–	–	1	1
North America	14	1	–	15
Western Europe	29	15	4	48
Latin America and the Caribbean	–	1	–	1
Totals	49	21	5	75

With respect to subject areas covered, specialized national systems tend to fall into subject categories associated with those covered by regional or international ongoing research information activities (e.g., 52,57). The most commonly reported areas of subject coverage, and the regional and international systems with which cooperative network affiliation was frequently reported, are identified in Table 10. Of the 75 specialized national systems included in the inventory, 51 (68.0%) could be related to a regional and/or an international system, an indication of the extent to which the development of one may be closely linked with that of the others.

TABLE 10. National Systems with Specialized Subject Scope: Commonly Reported Areas of Subject Coverage and Network Affiliations

Subject Area	Number of Specialized National Systems	Frequently Cited Regional or International Affiliations	
		Regional Systems	International Systems
Agriculture	11	AGREP (2.11)*	CARIS (1.2)
Education	9	EUDISED (2.6)	-
Transportation	7	DOK BASt (2.5)	IRRD (1.16), IRF (1.24), ICTED (1.9), TRRL (1.19)
Social Sciences	7	ASI (2.18), ZA (2.3)	DARE (1.21)
Environment	6	ENREP (2.12)	-
Development	6	-	IINDR (1.12)
Information Sciences	5	-	ISORID (1.13), FID/RRS (1.5)

*Numbers in parentheses refer to inventory entry numbers.

Regional Systems and Services

Few clear trends in the development of regional ongoing research information systems are evident from the available data (see Tables 4, 5, and 6). Regional systems tend to be based on affiliations which relate variously to geographic colocation, common languages, geopolitical associations, and cultural ties. Included in the inventory are descriptions of 19 regional systems, all of which have specialized subject coverage. Three of these cover research in the agricultural sciences—AGREP, currently being developed by the Commission of the European Communities (cf. Entry 2.11), the Swedish Council for Forestry and Agricultural Research, which covers the Nordic countries (cf. Entry 2.19), and *Records of Research* in the East African Community (cf. Entry 2.14). Two regional systems cover linguistics research—the European Research Information Service on Modern Languages, operated by the Centre for Information on Language Teaching and Research under the auspices of the Council of Europe (cf. 57 and Entry 2.7), and the Nordic Documentation Centre for Linguistics (SPRAAKDOK), currently being planned in Sweden (cf. Entry 2.10). In the field of road transportation, three regional systems are included, two of which are also operated on an international basis. These are described in some detail in the following section.

Most of the larger regional systems and some of the smaller ones depend on the intermediary collection of ongoing research information at focal points established at the national level. In many cases, national focal point activities which support regional systems also serve as a basis for both the further processing of national information and for the dissemination of international and regional information to the national R & D community.

Regional systems tend to promote a degree of standardization and compatibility which enhances both the processing of large quantities of information and its transfer on an international basis. Initiatives toward standardization encompass project record formats and data element specifications, classification structures, and the use of one or at least a limited number of common working languages. To date, most ongoing research information activities at the regional level have been established in Western Europe (15 of 19 systems), where the greatest number of specialized national systems are concentrated (see Table 4). There are some indications, however, of regional interest in the establishment of systems in the field of agriculture covering Southeast Asia(43) and Latin America and the Caribbean(45).

International Efforts

Included in the inventory are 24 systems and services in ongoing research information which are being planned, developed, or operated at the international level (see Tables 4, 5, and 6). Four of these activities are being carried out within the United Nations system: 2 by Unesco, 1 by the World Health Organization (WHO), and 1 by the Food and Agriculture Organization (FAO). Of the remaining 20 systems, 3 are operated by other intergovernmental organizations, such as the Organisation for Economic Co-operation and Development (OECD), 5 are operated by nongovernmental international organizations, such as the International Federation for Documentation (FID), and 12 are operated on an international basis by national organizations. Unesco has been particularly active in encouraging international cooperation in the ongoing research information field, not only through the initiatives undertaken within the framework of the UNISIST program, but also through the establishment and operation of the ISORID (cf. Entry 1.13) and DARE (cf. Entry 1.21) systems and through its contributions to the development of regional and international networks in mass communications research (cf. Entries 2.1 and 1.18) and research in the information sciences (cf. Entries 3.1 and 1.5).

Two additional systems are under development within the United Nations which are relevant to the ongoing research information systems included in the inventory. The first is the common register or inter-organization project register (CORE), an inventory of United Nations development assistance projects, including some R & D projects, maintained by the Inter-Organization Board for Information Systems (IOB) in Geneva(18). The second is SPINES, a Unesco pilot program on the application of science and technology to development(83). A key component of the SPINES system is the multidisciplinary, polyhierarchical SPINES thesaurus which has been proposed for experimental use in indexing ongoing research project information at national and international levels.

International systems, as do regional systems for ongoing research information, tend to promote system compatibility and standardization. This is particularly true of systems which depend on national or regional centers for data collection and transfer, for it is at these centers that the standardization of record formats, classification, and, in some cases, language is often accomplished.

International ongoing research information systems operated by national organizations tend to rely on direct input solicitation through individual scientists, performing organizations, and supporting organizations, rather than on a formally structured network of intermediary data collection points at the national level (e.g., 79). This also tends to be true of systems operated by international organizations which cover highly specific subject areas, such as research in arid zone ecology (cf. 78 and Entry 1.7). International systems with broader subject scope generally seek to establish national or regional coordinating or information transfer centers as means of providing for system input and information exchange. The CARIS system (cf. 14,21,26 and Entry 1.2) operated by FAO, for example, anticipates the eventual establishment of Regional Centres which, like the CARIS Liaison Offices to be established at the national level ". . . would be in charge of data collecting, indexing and processing, and dissemination of information, through services to users in their respective areas"(21).

Another example of a highly sophisticated, cooperative network is that developed by the International Road Research Documentation (IRRD) system (cf. 72 and Entry 1.16), in conjunction with the International Road Federation (IRF) (cf. Entry 1.24) and the Transportation Research Board (TRB) (cf. Entry 49.9), for the collection and exchange of information on road research throughout the world. This network relies on input solicitation at the institutional level—by IRRD (and in some cases by affiliated national systems) in 15 OECD member countries, by IRF in 57 additional countries, and by TRB in the United States and some additional countries. Information collected in OECD member countries is processed in one of three original languages by Co-ordinating Centres located in France (cf. Entry 1.16), the Federal Republic of Germany (cf. Entry 2.5), and the U.K. (cf. Entry 1.19). Information processed in French and German is forwarded to the U.K. Co-ordinating Centre where it is translated into English and exchanged for information collected by IRF and by TRB(72). The Highway Research Information Service (HRIS) (cf. Entry 49.9) serves as the processing center for the TRISNET system which is operated by TRB for the U.S. Department of Transportation(91). TRISNET includes U.S. information as well as information selected from that collected by IRRD and IRF.

This extensive network is further enhanced by the fact that IRRD cooperates with the system on International Co-operation in the Field of Transport Economics (ICTED) (cf. Entry 1.9) of the European Conference of Ministers of Transport (ECMT) in the collection of data appropriate for both files. By way of avoiding duplication of input registration, IRRD provides ICTED with relevant project descriptions for incorporation into the ICTED file.

Strategies for System Design and Operation

Ongoing research information systems are designed to provide for the systematic collection, processing, storage, and retrieval of data describing individual research projects at various stages of their completion. At least five specific characteristics distinguish ongoing research information systems from those designed for the processing of bibliographic information. These have been set forth in careful detail by Lazar et al. essentially as follows(56):

- *First*, the data registered in the ongoing research information system do not refer to any document, such as a publication or a technical report, which exists independently of the system. This suggests a requirement for specific organizational efforts aimed at the preparation and registration of research project information.

- *Second*, the ongoing research information data base is dynamic in nature. The descriptions of research projects in their initial stages are likely to lose significance when the results of research become available through bibliographic information channels. Because of this, the data base requires constant updating, not only to provide for the registration of new information, but to reflect the changing relevance of older information in the file.

- *Third*, comprehensive data collection usually requires input from a diversity of performing and supporting institutions. This generally necessitates a major and continuing input liaison effort, and it may result in the registration of information in a wide variety of formats.

- *Fourth*, access to ongoing research information relevant to the system's scope may be restricted for proprietary reasons or for reasons involving national interests. This makes exhaustive coverage a goal which is at best difficult, and in many cases impossible, to attain.

- *Fifth*, operation of the ongoing research information system must take into account a wide range of user needs. Scientists and research managers normally require highly specific information access at the level of individual research project descriptions, whereas the use of ongoing research information for policymaking is likely to require the aggregation of project data into more general analytical categories.

These distinguishing characteristics imply certain functional requirements for the ongoing research information system which are usually addressed in terms of strategies for system design and operation. Functional requirements which tend to be of major importance to the system include those involving input acquisition, selection of key data elements, methodologies for information processing, product and service concepts, and system economics. Some of the similarities and differences among systems included in the inventory and some of the significant problems in system design and operation highlighted in the literature are discussed in these contexts in the paragraphs below.

Strategies for Input Acquisition

There is nearly universal agreement on the desirability of comprehensive coverage of research which falls within the scope of the system (e.g., 53,56,63,84), and it is toward this objective that input acquisition strategies are generally directed. As Lazar has pointed out, exhaustive national coverage of research in progress in the Socialist countries is facilitated by the fact that research is financed through public means and is executed by public institutions which can be obligated to provide appropriate data for the system(56). In countries with mixed economies, however, particularly those in which institutional interactions take place in a highly pluralistic environment, comprehensiveness of coverage tends to be a more complex problem. In most such cases, research financed outside the public sector is proprietary for economic reasons, and thus unavailable; in some, legal steps which might obligate public institutions to record and transfer information on research in progress within their institutional jurisdictions may not be feasible(38).

With respect to systems which rely on voluntary cooperation for the registration of research project information, input acquistion strategies tend to fall more or less neatly into three categories:

- direct input solicitation from individual scientists or performing organizations on a periodic basis, often in conjunction with the delivery of services as an incentive for project registration(30,78);
- establishment of formal or informal agreements with supporting and, in some cases, performing organizations to provide for systematic and continuing project registration(53,62); and
- development of cooperative networks which link systems with affiliated centers to provide for intermediary collection, processing, and often exchange of the information(49,72).

In practice, many systems apply more than one of these strategies as a means of assuring the widest coverage possible. Implicit in each of the strategies, however, is the assumption of *quid pro quo*, i.e., the delivery of a service of some kind in return for the effort involved in the recording and transfer of research project information for registration. Such a service usually takes the form of the availability of the whole as compensation for the preparation of each of its parts. This underlying concept of information exchange can have major implications, which are discussed below in greater detail, bearing on the economic aspects of system operation.

Specialized national systems and international systems with highly specific subject coverage tend to rely on direct contact with individual scientists and performing organizations for input solicitation. In some cases, such systems operate in conjunction with related professional organizations as a means of facilitating the identification of scientists working in a particular specialty and of encouraging their registration of project information. In other such cases, input is sought through continuing contact with research centers which specialize in work in the particular subject area covered by the system.

Subnational and national systems with broad subject coverage tend to work toward the development of institutional arrangements, with either performing or supporting organizations, as a means of providing for the registration of information on large numbers of projects on a continuing basis. And, as indicated above, international systems with broader as opposed to highly specialized subject coverage tend to seek cooperative networking arrangements at national and/or regional levels in order to assure the continuing availability of system input.

A major input acquisition concern exists with respect to the quality of individual project records submitted for registration with the system. This concern tends to focus on the descriptive content of project titles and narrative

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project summaries (e.g., 68,81), although it has also been voiced in terms of key administrative data elements (e.g., 28,54). Quality control measures which can be taken by systems within their own resources, such as validation through direct contact with principal investigators, offer interim solutions, but these measures tend to involve rather high and recurring costs. In the long run, it may prove more effective to deal with the question of quality on a more permanent basis—through the adoption of guidelines(80,100) or models(70) for the preparation of project summaries, for example, and through steps designed to improve recognition by researchers of the value of the system to their own work.

The frequency with which project records in the system are updated and information on new projects is collected is a further consideration affecting strategies for input acquisition. The methodology or scope of a project may change during the course of its existence, progress reports may become available as interim findings are documented, or the research may be abandoned as unproductive. For these reasons, most systems seek updated project information on a periodic basis. This can involve returning project records to individuals or performing organizations for review and revision; or, for systems operating on the basis of institutional arrangements for input, it may be tied to institutional funding cycles, both as a matter of administrative convenience and of economy. New project information is collected under a wide variety of procedures ranging from continuing registration, as new research starts are authorized, to periodic inquiries on a one–, two–, or even a three–year basis, depending on the resources available to the system and the willingness and ability of the information sources to record and transfer the information.

One final consideration affecting input acquisition planning is the amount of effort required of the originator of the project record in completing the input form(15). The complexity and the length of the form might serve as useful indicators in this regard, but no overall measures are available to quantitatively relate these indicators to comprehensiveness of system coverage. It seems safe to assume, however, at least for systems which rely on voluntary input, that as the degree of difficulty in completing the input form increases, so too does the organizational effort required of the system to encourage system input. This makes the decision to include or exclude a narrative summary of the research project a relatively important one, because preparation of a summary may impose a requirement for information not otherwise routinely available(81). Nevertheless, some 69.5% of the systems included in the inventory report that narrative summaries are requested as an integral part of the input solicitation process, indicating a broad consensus on the need for summary information for the delivery of system services.

Selection of Key Data Elements

As Samaha points out in his draft summary of the UNISIST/SSIE international symposium on ongoing research information, there is little agreement among existing systems on the type or scope of the data elements to be included in the research project record(69). The detailed comparison conducted by Doggen of data element utilization in 14 systems reveals further that, although the systems examined reflect a "logical compatibility," "technical compatibility" is nonexistent(20). In comparing the data elements in three systems with those recommended in the UNISIST guidelines(84), Neelemeghan, too, notes a certain commonality, but cites a need for improved standardization as a basic requirement for information transfer from institutional to national, regional, and international levels(63).

In the context of international transfer of ongoing research information, both Samaha(69) and Doggen(20) also point toward the necessity for the unification and standardization of data elements and their representation, and Samaha has recommended that UNISIST pursue discussions with the International Organization for Standardization (ISO) in this regard(69). The potential impact of such discussions would appear to hinge on a rather widespread agreement with respect to the data elements which are essential to the operation of the system and to the national, regional, and international purposes which are intended to be served.

TABLE 11. Data Elements Recommended by UNISIST and Data Element Utilization

	Data Element Utilization	
Data Elements Recommended by UNISIST	**Number of Systems**	**% of Total**
Project Title	171	96.6
Name of the researchers		
(a) Principal investigators	163	92.1
(b) Coinvestigators	125	70.6
Institutions with which the researchers are affiliated		
(a) Principal investigators	172	97.2
(b) Coinvestigators*	18	N/A
Type of research*	14	N/A
Starting date of the project	146	82.5
Academic degree, if any, for which project is being undertaken*	8	N/A
Keywords, descriptive words and phrases	142	80.2
Optional Data Elements		
Abstract of the project	123	69.5
Source and amounts of financial support		
(a) Source(s)	139	78.5
(b) Amount(s)	105	59.3
Citation list of prior related research	91	51.4
Budget breakdown*	11	N/A

*Not specifically included on the inventory questionnaire

The UNISIST guidelines(84) and the efforts by Neelemeghan(63), Samaha(69), and Doggen(20) represent important first steps toward international unification, as do the preliminary considerations being given to the problems of standardization within the UNISIST program(98). Of the 177 systems included in the inventory to which data element considerations apply, a majority reported the availability of each of the data elements recommended in the UNISIST guidelines(84), when their identification was specifically requested on the inventory questionnaire (see Appendix). As is indicated by the data in Table 11, an average of 153 systems (86.4%) incorporate what are considered to be "essential data elements"; and an average of 115 systems (65.0%) incorporate the "optional data elements" as well (excluding, in both cases, those data elements not specifically requested on the inventory questionnaire).

Processing Methodologies

Subject classification is undertaken by all but the very smallest systems and those which rely exclusively on free text searching. Systems included in the inventory report subject indexing methodologies which differ in terms of the type of classification structure employed and the source of subject indexing, and a number of approaches have been proposed for general use (e.g., 12,16,36,67,83,95). Selection of a classification structure depends heavily on the use for which it is intended, and, once selected, it has important implications for the future development of system services. Some classification structures designed for use in published inventories may not lend themselves well to subject searching and retrieval, for example(17), and the preselection of a structure designed for a particular analytical application may preclude the compilation of information in all other analytical contexts(94).

Classification structures currently in use range in degree of flexibility from those which employ rather rigid, fixed subject terms and subject-term relationships to those which are open-ended and highly flexible in order to permit rapid changes as new concepts appear and older concepts become obsolete. These structures also range from those which are focused on the needs of particular programmatic missions or scientific disciplines to those which seek to provide more global approaches to the coverage of multidisciplinary areas.

The sources of subject indexing, as reported by systems included in the inventory, can be grouped into general categories as follows:

- indexing applied by scientists or information specialists at the time and within the organization in which the project record is prepared;

- indexing applied by scientists or information specialists within the organization operating the system; and

- machine-assisted indexing applied through computer scanning of the title or the title and text of the project record.

Again, in practice, many systems apply combinations of these techniques, such as machine-assisted indexing supplemented by professional review(42), or keyword indexing by the individual preparing the project record, subject to control against a thesaurus by subject specialists working within the system(17). Indexing by scientists or subject specialists (as opposed to indexing by information specialists) is reported by approximately 82% of the systems included in the inventory. In 28% of these cases, the scientist is either the principal investigator or is otherwise located within the organization which prepares the project record. In the other 72%, the scientist or subject specialist works directly with the organization responsible for the operation of the system.

The problems posed by multiple languages are faced by several systems at the subnational and national levels, and by most regional and international systems. Of the 179 systems included in the inventory, 30 employ more than one working language (see Table 6), and most of these use multilingual subject indexes or thesauri for indexing and retrieval. A number of other systems seek input from sources of differing original languages, but restrict processing to a single working language. Such systems occasionally provide for the recording of project titles in original languages, and often use multilingual subject vocabularies. Project registration in one of the working languages of the system is generally requested, but some systems have found it necessary to provide for the translation of project records received from sources unable to do so.

Full automation is reported by approximately 48% of the systems included in the inventory, partial automation by another 13%, and manual operation by the remaining 39%. Of the automated systems, 36 report on-line applications, either for input processing or for on-line retrieval. Automation is not a basic requirement, however, for highly specific subject retrieval. The Smithsonian Science Information Exchange (SSIE) in the United States (cf. Entry 49.17) has reported, for example, that when conversion to a fully automated system was effected in 1963, annual processing volume had grown to in excess of 60,000 project records(53).

Just under 60% of the systems in the inventory are operated in conjunction with other scientific and technical information resources, such as those designed to process bibliographic or patent information and those which deal with scientific and technical data. The integration of information about ongoing research with information on the results of completed research has distinct advantages(17,56) and some disadvantages. The advantages have to do with economies of scale and an ability to track research efforts from their inception, through their completion, to the availability of their results. The disadvantages tend to relate first to the characteristics which distinguish information about ongoing research from other types of scientific and technical information, and second to the unique processing requirements these characteristics imply. Because of these distinctions, independent philosophical and methodological approaches have been taken in some countries—by ongoing research information systems on one hand, and by systems for the processing of the technical report literature on the other—which have resulted in the development of systems operated along lines which reflect fundamental organizational and technical incompatibilities.

Dealing with completed and terminated research is another consideration which must be made by the ongoing research information system(56). This involves decisions regarding the length of time, after completion of a research project, that project records should be retained on the active file; incorporation of information on progress during the life of the project; inclusion of information on the availability of monographs, white papers, interim or final reports, and scientific data; and identification of research projects which for one reason or another may be terminated prior to completion. In this final context, the ongoing research information system may be the only existing, systematic means of access to information on research which is abandoned as unproductive, a feature which may be of some consequence when one considers that some research may be tentatively set aside for reasons which are later invalidated by changing conditions.

Product and Service Concepts

The ongoing research information systems included in the inventory report the delivery of system services which fall into two general categories:

- compilations which focus on the scientific aspects of specific research activities; and
- aggregations of research project data on research activities in more general areas of science and technology.

Strategies for System Design and Operation

Compilations relating to the scientific aspects of research activities tend to highlight the scientific and technical content of individual research project records, and tend to be directed at users acting at operational levels in the capacity of research investigators. Such compilations take the form of periodic publications and of the delivery of current awarness and retrospective search services.

Aggregations of research project data in analytical formats, on the other hand, tend to focus more on the administrative content of the research project record, and are directed at users acting in managerial or policymaking roles. Although such products may be compiled by subject area or by subject area subsets, their primary aim is the delivery of statistical data which can assist in the decisionmaking process by providing a quantitative overview of current (or of time series) activities for a particular element of the R & D community.

Directories or inventories of research in progress are the most visible output products reported by the systems and services included in the inventory, 59 of which report their availability. Such publications tend to utilize available data elements in order to provide indexes to research institutions, investigators, supporting organizations, and subject areas, and in some cases they also include statistical data presented in various formats.

Current awareness and retrospective search services are provided by 147 of the 179 systems included in the inventory. These services take the form of searches by subject area, by investigator name, and by supporting or performing research institution. They tend to offer the advantages of timeliness and responsiveness to the individual needs of particular users over access to published ongoing research information. Retrieval services are generally performed within the system itself for delivery to end users, although on-line access by end users or intermediaries is offered by a limited number of systems.

Beyond nominal prices which may be charged for publications containing ongoing research information, the assessment of user fees for system products and services is not a prevalent practice. Forty of the 147 systems reporting the availability of retrieval services (27.2%) indicated that fees were charged for their delivery. It might be speculated that one of the reasons for this relates to the difficulty inherent in charging users, whose cooperation is required for system input, for access to the information once it is available for retrieval. Moreover, the utilization of ongoing research information seems to be far enough removed from the traditional patterns of scientific communication that encouraging use tends to be a major operational consideration(40,53,69). Even with free access to system services or nominal charges for publications, some problems have been reported with respect to the collection of project information at an optimal level of detail and quality (e.g., 64,68,81).

Economic Aspects of System Operation

The distinctive characteristics of ongoing research information systems identified previously have major implications for the economics of system operation. Data collection, for example, requires extensive and continuing efforts on the part of the system, as well as on the part of the individuals and institutions which provide system input. The dynamic nature of the information requires that the system provide, again on a continuing basis, for the updating of project records and for the deletion of project information as it becomes obsolete. The fact that the system must respond to a wide range of user needs necessitates special considerations in terms of processing the information for storage and retrieval and of designing output products and services.

These factors tend to drive the cost of operating the system upwards over time, particularly so in cases where the system, either in response to demands by users or of its own initiative, takes steps to improve the comprehensiveness and scope of its coverage or of its services. Not only do these steps require resources in and of themselves, but their successful implementation results in an inevitable increase in processing workloads and associated costs, and the justification for allocating increasing resources to the system becomes more difficult.

The impact of these considerations varies, depending on national economic structures. In the Socialist countries, for example, resource requirements tend to be considered within the context of the overall process of economic planning, and information systems are an integral part of this process. Outside the Socialist countries, on the other hand, information activities tend to be assessed in terms of the relationship between the benefits expected from the system and the resources required for the delivery of those benefits.

In cost/benefit terms, the cost of system operation is relatively easily measured, but the benefits are not. The value of improvements in policymaking or in the process of scientific communication which may result from use of the system cannot be readily quantified, and even the savings resulting from avoidance of duplication at an operational level may be difficult to identify(40). As a result, justification of the cost of the system tends to be either implicitly accepted by system sponsor/users(27) or to be expressed in terms of a service to the community which the community should logically support(40).

Where the financial support for the system and the primary utilization of system services lie within the same institutional configuration, implicit acceptance of the cost of the system tends to prevail(53). As costs rise, however, this implicit acceptance may diminish, resulting in a requirement for a more explicit justification of the system, either in terms of its societal value or in terms of a broader distribution of the benefits derived from the system. For this reason, encouraging use can become necessary, not only within the context of the original institutional constituency of the system, but also with respect to expansion of the user base to include a more widespread user community.

This presents a strategic dilemma for the system, because the extension of services to a broader range of users tends to raise the issue of whether system costs might not reasonably be allocated in a similar fashion. It can lead, in other words, to the assessment of user fees as a means of offsetting rising operational costs. Not only can this complicate input solicitation, because of its inherent *quid pro quo* nature, but it can result, as well, in the exclusion of users unable to pay for access to the benefits of the system. For systems which choose not to charge user fees, this would appear to indicate the desirability of the early establishment of specific operating parameters governing the scope of the system and its services, as a means of at least partially deflecting pressures which later might be met only with considerable difficulty.

Some Long-Range Issues

The activities sketched above highlight the complexity inherent in the ongoing research information enterprise. In view of this complexity, it would be premature to attempt a detailed, systematic forecast of long-range trends in ongoing research information. The following suggestive outline may, however, facilitate initial discussions of some of the issues and alternatives considered in the literature which bear upon future developments in the field.

Looking toward the 1980's, national, regional, and international stakeholders in ongoing research information tend to agree that their respective concerns cannot remain static, that something must be done if future needs are to be met in reasonably adequate ways(69). Long-range matters are usually considered in terms of two broad, interrelated requirements(99):

- the need for a continuing discussion of long-term policy issues dealing with ongoing research information in an overall context; and
- the need for long-term strategies at the operational level focused on specific systems, services, and related activities for ongoing research information.

These long-range needs, many aspects of which have not yet been clearly articulated, present significant opportunities and challenges.

At the policy level, long-range issues tend to be addressed in terms of a response sensitive to emerging worldwide social and economic aspirations. It is generally recognized that ongoing research information constitutes a resource of considerable potential value(69). In light of evolving social and economic pursuits, the need for cooperation toward more effective sharing of this resource is considered to be an issue of key importance. Attempts to resolve this issue may turn on a "harmonization of international efforts" in the general sense envisaged by the UNISIST program(99).

In one vital area, resource sharing among systems across national boundaries, a constructive policy is assumed to entail several strategic alternatives:

- The transfer of ongoing research information can be effected multilaterally through regionally and/or internationally managed systems for the collection and distribution of the information, an alternative which Woolston has labeled the "territorial formula" approach(97).
- Ongoing research information can be obtained in negotiated bilateral arrangements for information exchange on a *quid pro quo* basis.
- Access to ongoing research information can be provided on a cost-recovery basis which entails fees charged by systems supplying the information.
- Direct access to geographically dispersed sources of ongoing research information can be facilitated through uses of referral services.

Depending on the relative advantages as seen in particular situations, preferences for long-term resource sharing approaches seem to vary from exclusive reliance on one of these strategies to a flexible mix which includes two or more options simultaneously.

The multilateral, territorial formula approach seems to be regarded as an especially attractive option for developing countries with limited fiscal resources(96). It is assumed that, because of overriding economic constraints, such countries may prefer to participate in the evolving regional and/or international networking schemes for cooperative information exchange. However, the long-range advantages and disadvantages inherent in such schemes have not yet been fully evaluated.

Territorial formula systems for information transfer in science and technology tend to be modeled on the very effective bibliographic prototype, the International Nuclear Information System (INIS) operated by the International Atomic Energy Agency. In principle, the territorial formula concept is expected to offer certain important advantages. Under this concept, each participating country provides only a portion of the total annual input to the regional or international data base but, in return, receives all of the entries aggregated in this fashion. The territorial formula model is thus considered to be in the national interest as far as individual participating countries are concerned(25,73). This approach can lead to additional benefits, including valuable training for information professionals in developing countries, and, as has been the case with the International Specialized Information System for Research and Development (ISIS R&D) (cf. 76,77 and Entry 1.17), standardization of processing formats and indexing vocabularies(24), and agreements on international carrier languages.

But the "territorial formula" strategy has also been viewed with certain reservations which may have a bearing on future attempts to expand the number and scope of internationally managed ongoing research information systems(8,9). In the first place, some believe that international networking may tend to be less effective outside such highly developed fields as nuclear science. A major emphasis on comprehensive input may also affect the quality and timeliness of the information contributed to the international pool, limiting the value of system output products and services. This may be particularly true with respect to ongoing research information, because of its limited "shelf life." Those countries called upon to make substantial input contributions to a number of international systems may find it increasingly difficult to respond, because of the significant economic and organizational considerations involved. Moreover, the economic viability of internationally managed processing systems may depend on complex arrangements for subsidies from intergovernmental sources, and these tend to be difficult to establish and sustain.

Such considerations have undoubtedly played a part in recent decisions to modify the initial program plan for CARIS, the international ongoing research information system for agriculture. On the basis of earlier technical evaluations(14), it was felt it would be desirable to pursue a somewhat less ambitious initial program in the coverage of research conducted in developing countries(26). Specifically, it was decided initially to omit the narrative research project summary at the international level, a necessary step in view of the costly, labor-intensive processing involved.

In territorial formula systems, operating economies and tractable processing can, of course, be achieved in a number of different ways. In general, the need for economy calls for a judicious approach in circumscribing the overall scope of system operations. Carefully focused, limited coverage in terms of subject scope, input volume, and other important parameters may actually enhance the utility and quality of system outputs, and a trend toward a more realistic definition of system goals is evident in some of the current planning efforts for international information systems. For example, in the proposal for an international Development Sciences Information System (DEVSIS), the data base concept provides for two main components: File One, which will contain bibliographic records, and File Two, which will be a directory of information sources and services(19).

Some Long-Range Issues

The availability of File Two, which will provide a referral service, will make it possible to limit File One to a manageable size.

The present inventory contains examples, such as IRRD (cf. Entry 1.16) and CCRESPAC (cf. Entry 1.3), of international system efforts for ongoing research information in which a narrowly circumscribed subject scope emphasizing urgent research priorities has been combined with careful quality control. In view of the general effectiveness of this strategy, some of the current discussions of long-range prospects appear to focus on possibilities for additional international systems of this highly specialized type.

The fact that sophisticated, but specialized, data bases of ongoing research information can have a beneficial impact on socioeconomic development seems to be widely appreciated(35,93). Such data bases cannot only make a major difference in programs which depend on the rapid and effective transfer of advanced technologies from industrialized nations to developing countries(93), but they can also be used, individually or collectively, in specific societal problem-solving applications, including policymaking, which play an increasingly vital role in the industrialized countries.

Selective institutional coverage, which has proved effective in certain system efforts at the national level such as Canada's Information Exchange Centre for Federally Supported Research in Universities (cf. Entry 9.4), constitutes a further, potentially useful means of narrowing the operational scope of international systems. It has been suggested, for example, that certain innovative approaches to international information transfer might be developed around an established network of international research centers([illegible]0). Pool et al.(66) have outlined an experimental design in which globally distributed, international agricultural research centers would be interlinked in a modern telecommunications network involving low-cost transmission via communications satellites. Initially, the proposed experimental network would enhance the exchange of information about agricultural research generated at participating centers, including information on agricultural research in progress. Eventually, the project-level information exchanged within the network might also be disseminated to various important research applications programs outside the research center network.

Concerning the second alternative—bilateral information exchange on a *quid pro quo* basis—there have been few concrete proposals to encourage "barter" approaches to resource sharing between individual ongoing research information systems. Bilaterally negotiated arrangements for information exchange between systems call for agreements to supply a given cooperating system with a specified amount of information meeting certain quality requirements in exchange for information of equivalent value. Thus, from an operational standpoint, negotiated bilateral exchange can be a viable alternative, provided comparable volumes of useful input are available for this purpose. In the bibliographic field, the prevailing tendency thus far has been to confine bilateral approaches to certain major bibliographic systems operated by governmental or private organizations in developed countries. However, these approaches have not yet been studied in their wider implications(8,9).

Bilateral exchange of ongoing research information could, under certain conditions, be used as an additional means of facilitating technology transfer from industrialized to developing countries. Conditions favoring this particular approach are still relatively rare as far as individual developing countries are concerned. It has, nevertheless, been assumed that this problem may be amenable to solutions at the regional level: one answer may be to "pool resources and capabilities in regions in Asia, Africa, and Latin America and develop data bases in selected subject areas within these regions"(35). According to this view, development of consolidated data bases on a regional basis would provide specialized information resources of such major comprehensiveness that they would be of value not only to users in developing regions, but to users outside these regions as well. Systems operated in developed countries might then be more inclined to exchange information or to facilitate direct access to their own resources in return for similar services.

In spite of the potentials just mentioned, there have been relatively few initiatives toward the further development of specialized systems at the regional level. The statistical overview presented above indicates that, outside Western Europe, the number of regional ongoing research information systems is relatively small to start. It is not inconceivable, therefore, that regional systems may constitute one of the priority topics in future policy deliberations. In this context, a salient consideration in practical terms is the need for carefully planned feasibility studies and prototype demonstrations which would shed light on the effectiveness of the regional system concept. Prospects for cooperative regional efforts along these lines are being discussed with a view toward selective, quality-controlled coverage of agricultural research projects in Latin America and the Caribbean(45).

The third option, which entails fees charged by systems supplying ongoing research information to other systems, can offer important advantages in certain situations involving resource sharing across national boundaries. Significant ongoing research information resources can, in principle, be obtained for a fee from systems which seek to recover their operating costs through output wholesaling or retailing under a wide variety of arrangements. This includes the provision of broad scope or specialized machine-searchable data bases and other services covering advanced areas of research. On the whole, the fee-based strategy can be highly responsive to given client system needs which can, as a rule, be met readily in direct, flexible, bilateral transactions involving a minimum of administrative constraints. Technical assistance, which may be required toward uses of this information, might reasonably be made available on the same basis(35).

Provided the required funds are available, the fee-based approach to acquisition of ongoing research information can lead to significant shortcuts for individual developing countries concerned with urgent technology transfer priorities. Since this route is not usually accessible to developing countries with limited information budgets, the wider availability of information subsidies from intergovernmental and other donor agencies is considered to be one of the more pressing issues. Industrialized countries, on the other hand, tend to be in a better position to acquire strategic ongoing research information resources for a fee. In some cases, regional groupings of industrialized countries might consider pooling budget allocations toward this end. There is, in any event, a need for studies of the fee-based approach, especially in view of the fact that only 40 of the systems included in the present inventory report the charging of user fees for the delivery of ongoing research information.

The fourth alternative calls for improved referral approaches which can facilitate direct access to numerous geographically dispersed systems and services for ongoing research information. Such approaches can complement and augment the resource sharing strategies considered under other strategic options. The referral concept can provide a low-cost alternative to massive, internationally managed systems for ongoing research information, particularly in situations which would make it impractical to maintain a single file of research project descriptions. In essence, the referral mechanism does not supply specific ongoing research information in response to user requests. Instead, such requests are forwarded to the most appropriate source for reply.

The International Referral Service of the United Nations Environmental Programme (UNEP) provides an important illustration of an internationally coordinated referral mechanism consisting of a network of national referral centers in participating countries. The DEVSIS concept mentioned above includes provisions for worldwide referral to sources of ongoing research information in the development sciences(19), and the CARIS design provides for certain types of referral applications(21). Thus far there have been few other visible initiatives to improve referral capabilities emphasizing ongoing research information. It is reasonable to assume, however, that the present worldwide inventory of ongoing research information resources will play a part in future efforts to strengthen international referral services for the field.

Ultimately, long-term options for resource sharing in ongoing research information will have to be considered in the context of evolving trends for other information resources in science and technology, such as patent and bibliographic systems (e.g., 65,77). In fact, the future role of ongoing research information systems within the changing overall pattern of scientific and technological communication has been identified as another vital issue at the policy level(88).

The pattern of communication in science and technology is being affected by significant trends. One of these is the phenomenon referred to as the "information age," which is characterized, among other things, by an impressive growth in the production of information(2). Another trend, which is directly related to the information age, has been identified in terms of a growing preöccupation with various electronic alternatives to conventional communication. In some technologically advanced countries, policy analysts and information scientists have begun to study these trends in systematic ways (e.g., 50). However, in the generalized scientific and technological communication models emerging from these studies, ongoing research information has thus far been treated mainly in marginal terms.

It is, nevertheless, reasonable to suggest that ongoing research information could play a strategic role in comprehensive attempts to improve scientific and technical communication. In the information age, one of the basic issues to be addressed in these attempts has to do with the need to improve user access to the growing body of information. For example, the scientific and technical literature has tended to expand exponentially over time, but this rate of growth has, generally speaking, not been matched in the secondary services needed to facilitate access to the literature(2). Because of the organizational and economic problems involved, major delays in the expansion of such access mechanisms as bibliographic systems and abstracting and indexing services tend to be unavoidable.

With these shortcomings in mind, the ongoing research information system has, in some cases, been looked upon as a relatively low-cost alternative which can complement traditional access mechanisms, particularly so in subject areas not covered by existing services. By serving as "a key to the existence and availability of scientific expertise"(6), ongoing research information can provide direct and timely user access to potential sources of primary information. This alternative is, essentially, an extension of the standard referral approach to information transfer. It is being tested at the international level in the CARIS program mentioned above(21). Its potential impact at national and regional levels has not yet been assessed in quantitative terms, but it is safe to assume that ongoing research information used systematically for general-purpose referral could do much to alleviate deficiencies in the availability of bibliographic and other information services.

Ongoing research information systems which are already in place could, if necessary, be adapted for use in wider referral applications(11); in future systems, such applications could be included in the initial system concept. Furthermore, expanded use of ongoing research information for referral could be of particular value in developing countries which, according to Westrum(93), rely heavily on direct contacts with scholars and consultants.

In the tentative scenarios for forthcoming decades, which stress advanced electronic alternatives to conventional information exchange, enhancement of direct personal communication has been envisaged as a pivotal requirement. This is illustrated in the following assessment by Lancaster and Fayen(55), which also points to the need for directory components, including ongoing research information, as an integral part of the electronic communication networks of the future:

> Informal channels of communication will continue to be important. The new communications technology will assist rather than obstruct the personal communication process between researchers in a particular subject field. On-line networks will facilitate the transfer of information among scientists known to be working in related subject areas. [Electronic devices] may facilitate the exchange of ideas between such groups. Directories of

> information sources, personal and institutional, and of ongoing research projects . . . may be maintained on-line and can thus be accessed remotely from centers throughout the country.

On–line access to data bases of ongoing research information is already available in some instances, but the potential for integration of ongoing research information systems with more exotic network capabilities, such as computer conferencing, messaging, and editorial processing systems, constitutes one of the policy issues for future consideration.

Another issue, and one which has been pinpointed as central and particularly urgent, is the need for policies directed at the building of a solid base at the national level for resource sharing at regional and international levels(1,98). This need constitutes a recurrent theme in the recent literature, and it is also underscored in Samaha's draft summary of the 1975 UNISIST Symposium(69): "Participants have stressed the importance of each level but recommended . . . an approach starting with the national, going to the regional, and ending with the international level." In line with this recommendation, the paper identifies two principal policy considerations(69):

1) National services or systems of information are needed first. They are a prerequisite for regional and international systems.

2) National systems should be established on the basis of national needs, situation, and characteristics.

Thus, in the developing countries, national initiatives for ongoing research information systems and services are, typically, envisioned against a background linking information policies with urgent developmental priorities (e.g., 22,23). This kind of setting is illustrated in a synopsis of national conditions prevailing in Sri Lanka(75):

> In Sri Lanka, the need to harness every effort to social and economic developmental goals has led to the formulation of a development strategy in which science and technology play a significant role. To develop and sustain scientific activity at an effective level, an adequate system of auxiliary scientific institutions is a necessity; a national scientific and technological information network is a key component of such a system. Formal recognition of the validity of this is evidenced in a recent governmental decision to establish a national information system. Such a system, if it is to function as a vital input into the economy of the country—deploying scarce resources in the most appropriate directions—must necessarily be geared to developmental objectives and responsive to real needs, both current and projected.

In the Socialist countries "the necessary prerequisites are created for a systems approach to the organization of information on ongoing R&D on a nation–wide scale, embracing all generators and all potential users of such information"(59), mainly because the resources of science and technology are being coordinated within the overall plan for the national economy. In some Western countries, national coordination of ongoing research information efforts is motivated by clearly perceived national needs, which are exemplified in Brown's remarks on Canada's initiatives in this field(6):

> . . . it became very evident that essential to the establishment and management of a science policy was a detailed knowledge or national inventory of research and development being carried on in Canada . . . . This inventory was also vital to a national scientific and technical information system . . . .

It is generally recognized that effective implementation of ongoing research information policies at national, regional, and international levels hinges on one fundamental prerequisite: long–term operational strategies, designed to guide planning and development efforts focused on particular user requirements, systems, services, infrastructures, and necessary methodologies and training programs. The UNISIST program has been instrumental in initiating practical measures to provide such guidance, as clearly evidenced by its commissioning and publication of Wollman's valuable paper *UNISIST Guidelines on the Conduct of a National Inventory of Current Research and Development*(84). These guidelines present a thoroughgoing discussion of the basic considerations affecting the planning and implementation of a national ongoing research information system. They serve, as well, as an important, initial step toward improved international cooperation in the field, most importantly, perhaps, through the stimulation of further international dialogue (e.g., 63) on the minimum system requirements which they propose.

Wysocki(99) has pointed out that "the role of UNISIST in the establishment of information systems in ongoing research could be considered as conceptual and methodological." He has listed the following possibilities for concrete actions designed to implement this role(99):

- To develop projects dealing with further guidelines for unification of handling procedures, such as data elements, communications, formats, etc. for the improvement of information transfer.
- To develop a programme for advisory services based on national needs and providing technical assistance to Member States for the establishment and development of national services on ongoing research within the global, scientific, and technical information systems.
- To encourage the development of international cooperation in this field by organizing scientific meetings, publishing directories, and acting as an international focal point for information on ongoing research.

Thus it might be hoped that, in the future, those engaged in the ongoing research information endeavor will have access to UNISIST's advice and guidance in all areas covered by its traditional scope, including user survey methodologies, studies of barriers to information transfer, tools for system interconnection, standardization of formats and classifications, and training of information system practitioners.

Last but not least, it is important to note that, in the academic curricula and research programs of information science, ongoing research information has thus far received relatively little attention as a topic in its own right. Future measures in this area might address the need to strengthen the professional cadre and knowledge base of the ongoing research information field as a specialty evolving within the information science discipline. They might also focus on the use of ongoing research information as an integral part of the university education process. In the final analysis, significant progress in the field will turn on enlightened human effort.

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Profiles of Information Systems and Services on Research in Progress

Profils des systemes et services d'information concernant les recherches en cours

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Rédactrice
Smithsonian Science Information Exchange

Introduction

Presented on the following pages are detailed profiles of 179 ongoing research information systems and services throughout the world. The first section includes entries for 43 international and regional systems, arranged alphabetically by the English-language name of the system, first for international and second for regional systems. The second section contains entries describing 136 national and subnational systems, arranged alphabetically by country and, within each country, by the name of the system or service in English. Country names appear as listed in the Unesco *Manual of the General Conference* (Paris: Unesco, 1977, ISBN 92 3 10105 2). Following the inventory profiles are four indexes: An index of system, service, and organizational names; an acronym index; an index of persons responsible for the systems; and a general subject index to the fields covered by the systems and services described.

Individual entries were prepared from the completed questionnaires and supplementary material provided by respondents to the survey conducted by UNISIST and SSIE from December 1976 through August 1977. A copy of the survey instrument appears in the Appendix. Draft entries were returned to originating institutions for verification and correction of any inadvertent errors. In cases in which entry verification was not received prior to publication, the original entry was reedited against the questionnaire response and included in the inventory.

In general, entries were selected according to the following criteria:

- Scope—Current research information services covering all research fields serving social and economic development.
- Coverage—Information activities at national, regional, and international levels designed for the systematic collection and dissemination of prepublication information on current research and development efforts at the research project level. This information is generally assumed to span the period between the inception of research and the appearance of research results in the scientific and technical literature.

In view of the relevance of the inventory to the implementation of Resolutions 3362 (S-VII) and 3507 (XXX) of the United Nations General Assembly, some flexibility was necessary in applying these criteria in cases where inclusion of a system or service profile might significantly facilitate either the exchange of research information relevant to developing countries, or access by the developing countries to information on technologies suited to their specific needs. Furthermore, an exception was made for entries which describe efforts to provide for institutional or national coordination of ongoing research information activities. Finally, a limited number of entries were included for systems which deal primarily with research programs and provide only general information about specific projects.

Entries are numbered consecutively throughout in the sequence in which they are presented. The first digit of an entry accession number represents either an international or regional designation, or a country name (1.X, 2.X, 3.X, and ff.); the second digit represents the system sequence, within a particular category or country, in alphabetical order (X.1, X.2, and ff.). Entry accession numbers are cited for reference in the indexes and in the preceding overview.

Introduction

The data elements in individual system profiles correspond to those in the survey; as a result, the captions and responses were standardized to a certain extent. Where possible, additional remarks provided by respondents concerning specific system features were included in order to provide the most complete description possible. Some caption definitions are further amplified below:

- *Institutional affiliation(s)*—Insofar as possible, all organizational unit, organization, and affiliated organization names which were identified by respondents are listed in this section and appear in the system, service, and organization index. English language and original language versions for the names are given.
- *Geographic coverage*—This element refers to the primary geographic scope of the sources from which data are collected by the system, and not to the geographic scope of the research work described in the data base.
- *Institutional coverage*—The types of institutions listed are those from which system input is received, and not necessarily those to which output services are provided.
- *Retrieval services provided*—All types of information services identified are listed, with the exception of printed periodic or one–time publications.
- *Publications*—Publications containing ongoing research information or descriptions of related organizational activities are cited in this section.
- *Additional comments*—Under this caption an attempt was made to provide an overview of system activities, in order to place ongoing research information services in perspective with the overall information activities of the organization under discussion. Other remarks not applicable under standard data element captions are also included, as necessary.

In cases where certain data elements were unavailable, the captions for those data elements were omitted.

Of the four indexes following the system profiles, three were composed in large part by computer. System and service names, organizational unit and organization names, acronyms, and names of persons responsible were coded during the keyboarding process and later retrieved for sorting and index compilation. Non–English system or organizational names and acronyms appear in italics for clarity. The subject index was designed as a quick reference tool for inventory users, and is not intended to reflect an extremely detailed subject analysis. As a result, only broad subject levels are listed. These subject levels are identified in part by captions taken from the 2nd revised draft, June 30, 1977, of the FID/Unesco Broad System of Ordering (BSO).

Text for the inventory was produced using a computerized photocomposition process that permitted on–line entry and correction of copy and partially automated compilation of the associated indexes. The word processing software employed was the Word/One system of Bowne Time Sharing, 160 Water Street, New York, New York, U.S.A. 10038. Once the final manuscript was completed, photocomposed camera–ready copy in page format was automatically generated.

To facilitate this process, accent and other diacritical marks were either eliminated from non–English names or converted as follows: the Scandinavian 'a' with a circle was changed to aa and the slashed 'o' to oe; the German umlauted 'a', 'o', and 'u' were changed to ae, oe, and ue. Standard editorial references for English names and usage were: *Webster's New Collegiate Dictionary*, 8th edition (Springfield, Massachusetts: G. & C. Merriam

Company, 1973, ISBN 0 87779 309 3); *Webster's Third New International Dictionary Unabridged* (Springfield, Massachusetts: G. & C. Merriam Company, 1961); U.S. Government Printing Office *Style Manual,* Revised Edition, January 1973 (Washington, D.C.: U.S. Government Printing Office, 1973, Stock number 2100–00069); and the University of Chicago Press *A Manual of Style,* Twelfth Edition Revised (Chicago, Illinois: The University of Chicago Press, 1969, ISBN 0 226 77008 7).

As with any publication of this type, coverage of existing and emerging systems and services is not as exhaustive as one might hope. During the data collection effort, several systems were identified for which no completed questionnaire was received; and, without doubt, some systems appropriate for inclusion were inadvertently omitted from the survey altogether. Depending on the response the inventory receives, it may be updated at some point in the future. Updating of the text will be facilitated by the fact that it is stored on magnetic tape, and can be easily reprocessed to allow new additions or revisions to existing copy. With the possibility of updating in mind, users of the inventory are invited to forward to UNISIST or to SSIE comments and suggestions for future improvements.

International and Regional Services

INTERNATIONAL SERVICES

1.1 BULLETIN OF CHEMICAL THERMODYNAMICS

Department of Chemistry
Oklahoma State University
Stillwater, Oklahoma 74074
United States of America

Telephone: (405) 624–6676

System status: Operational system initiated in 1958
Person responsible: DR ROBERT D FREEMAN, Editor
Institutional affiliations:

- Commission on Thermodynamics (Commission I.2)
- International Union of Pure and Applied Chemistry (IUPAC)
- United States National Standard Reference Data System (NSRDS)
- Office of Standard Reference Data (OSRD)
- United States National Bureau of Standards (NBS) (principal funding organization)
- Oklahoma State University

DESCRIPTION OF THE SYSTEM

SCOPE

Geographic coverage: International
Subject coverage: Research and measurements in chemical thermodynamics
Institutional coverage: Academic and other research laboratories
Source of input: Individual scientists

FILE DESCRIPTION

Number of records processed annually: 400
New: 5% *Updated:* 95%
Number of records in active working file: 400
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, subject descriptors or keywords, project number assigned, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files, punched cards, and a computerized system operating in batch mode with magnetic tape processing and storage capabilities

System software: Custom software packages (available under certain conditions for use by others)—The substance/property index and bibliography sections of the *Bulletin* are generated in camera-ready form at NBS from magnetic tapes provided by the Thermodynamics Research Center, Texas A & M University (U.S.A.); the Institute of Microcalorimetry and Thermochemistry, Centre national de la research scientifique (France); the Chemical Process Data Evaluation Section, Division of Physical Chemistry, National Bureau of Standards (U.S.A.); and the Department of Chemistry and Biochemistry, Southern Illinois University (U.S.A.).

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services for the ongoing research information contained in the *Bulletin* are provided beyond issuance of the publication itself.

Publications: The *Bulletin of Chemical Thermodynamics* has been published once annually since 1958. The latest edition, Volume 20 (Stillwater, Oklahoma: Oklahoma State University, July 1977, 576 pp., Library of Congress catalog card number 63-2961, U.S. $20.00), covers information on research reports in the field that were completed but not published in 1976. A second major section of the *Bulletin* contains a bibliography of 1976 publications. These two sections are each accompanied by research indexes, and a single substance/property index is produced for both. News of scheduled meetings of interest, doctoral theses and seminar proceedings, and other activities is also included.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, individuals
Access limitations: Restricted to certain user groups
User fees: Yes
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

The *Bulletin of Chemical Thermodynamics* appeared under the title *Bulletin of Thermodynamics and Thermochemistry* from 1962 through 1976.

1.2 CURRENT AGRICULTURAL RESEARCH INFORMATION SYSTEM (CARIS) *SYSTEME D'INFORMATION SUR LA RECHERCHE AGRONOMIQUE EN COURS* *SISTEMA DE INFORMACION SOBRE LAS INVESTIGACIONES AGRONOMICAS EN CURSO*

CARIS Coordinating Centre
FAO-GIL Division
Via delle Terme di Caracalla
00100 Rome
Italy

Telephone: 5797
Telex: 61181 FOODAGRI
Cable address: FOODAGRI ROME

System status: Operational system initiated in 1976
Person responsible: MR. A. THEVENIN, Officer in Charge
Institutional affiliations:
Library and Documentation Systems Division
Division de la bibliotheque et des systemes de documentation (GIL)

Food and Agriculture Organization of the United Nations (FAO)
Organisation des Nations Unies pour l'alimentation et l'agriculture (OAA)

Funds in 1976–1977 are being provided by members of the Consultative Group on International Agricultural Research (CGIAR).

DESCRIPTION OF THE SYSTEM

SCOPE

Geographic coverage: International (developing countries at present)—Future coverage may include other countries, through interconnections with national or regional systems.
Subject coverage: Agricultural sciences research including forestry, nutrition, rural development, and inland fisheries
Institutional coverage: National government agencies, other national organizations, international organizations
Source of input: Individual scientists and performing organizations via national CARIS Liaison Offices

FILE DESCRIPTION:

Number of records processed annually: Not yet established
New: 30% *Updated:* 70%

Number of records in active working file: Records for 2,000 research institutions, 10,000 research workers, 3,500 research programs, and 2,000 research project titles are stored at present. Records for 30,000 research projects are planned for addition in 1978–1979.

Frequency of updating: Annual

Language of records: English, French, Spanish

Data elements included: Project title, principal investigator, performing organization name, performing organization address, research program of which project is a part—Starting in 1978, general project summary, project objectives, project methodology or approach, progress reports, coinvestigators, project start date and end date, subject descriptors or keywords, and bibliographic references will also be recorded.

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, classification tables, fixed hierarchical and nonhierarchical vocabularies (available for use by others)

Source of subject indexing: Indexing staff with and without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy—CARIS Liaison Offices in each country coordinate and assist in the collection of data provided by research institutions and research workers. Data is now recorded on three forms covering research institutions, research workers, and research programs. Starting in 1978, additional data on research projects will also be collected.

Processing and storage methods: IBM 370/145 computer using magnetic tape and disk storage and batch mode searching (on-line access will be available in 1978)—During the current (1975–1977) operational phase aiming at first establishment of the CARIS data base, data is collected from each participating country, and processed centrally at FAO Headquarters. Starting in 1978, it is planned to decentralize the updating of data and the provision of services to national and regional CARIS centers, with the FAO CARIS Coordinating Centre assisting in systems development and maintenance.

System software: The software used is the original ISIS software elaborated by ILO, suitably modified and complemented by Unesco and FAO to deal with multiple file processing for research data. The software will be made available after 1977 to all countries.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, on-line access, magnetic tapes—From 1978, services will be provided directly by each participating country or by CARIS regional centers.

Publications: A *Directory of Agricultural Research Institutions and Projects in West Africa* (Pilot Project - 1973) was issued in English and French as a result of the pilot studies conducted preliminary to the initiation of the CARIS system. This directory included information on 237 institutions and 1,555 research projects for 14 West African countries linked in the West African Rice Development Association (WARDA). The publication number is: MI/E2792/F/12.73/1/1200 (English); MI/E2792/F/12.73/1/1250 (French).

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations, and others
User fees: None at present
Descriptive material: Descriptive brochures in English, French, and Spanish are available on request.

ADDITIONAL COMMENTS

CARIS is interconnected with the International Information System for Agricultural Sciences and Technology (AGRIS), a worldwide information system covering agricultural literature.

The present CARIS system provides detailed information about research institutions, workers, and programs in developing countries. Directories of these three categories are scheduled for issuance in 1977 in English, Spanish, and French.

After 1978, funds for the CARIS Coordinating Centre will be provided by FAO, and support for CARIS national or regional centers will be provided by the participating countries.

1.3 CURRENT CANCER RESEARCH PROJECT ANALYSIS CENTER (CCRESPAC)

SSIE
Room 300, 1730 M Street, N.W.
Washington, District of Columbia 20036
United States of America

Telephone: (202) 381–4211
Telex: 89495

System status: Operational system initiated in 1974
Person responsible: DR. DONALD A. ELLIOTT, Director
Institutional affiliations:
International Cancer Research Data Bank (ICRDB)

National Cancer Institute (NCI) (principal funding organization)

National Institutes of Health (NIH)

United States Public Health Service (PHS)

United States Department of Health, Education, and Welfare (DHEW)

Smithsonian Science Information Exchange (SSIE)

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DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International

Subject coverage: Cancer research

Institutional coverage: National government agencies, other national organizations, international organizations, foreign organizations, nonprofit associations and foundations, colleges and universities, state government agencies, private industry (limited)

Source of input: Individual scientists, performing organizations, supporting organizations—Most input from outside the United States is collected via coordinators in each country identified through the International Union against Cancer *(Union international contra le cancer) (UICC)* in Geneva and the Latin American Current Research Information Project (LACRIP) at the Pan American Health Organization (PAHO) in Washington, D.C. Additional input is received from the International Agency for Research on Cancer (IARC) in Lyons.

FILE DESCRIPTION:

Number of records processed annually: 12,000

New: 33% *Updated:* 67%

Number of records in active working file: 18,000

Frequency of updating: Annual

Language of records: English

Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date (in some cases), supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references (in some cases), period for the project description, U.S. Government fiscal year, project monitor (in some cases)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Word sets located in the title or text which are equatable to conceptual or subject-oriented keywords organized in a fixed hierarchical vocabulary (available under certain conditions for use by others)

Source of subject indexing: Indexing staff with scientific background, computer—The SSIE system of subject indexing is used, plus additional conceptual indexing applied by staff scientists from specially developed CCRESPAC indexes.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form

Processing and storage methods: Computerized systems operating on-line and in batch mode—The SSIE system is employed for input, processing, and in-house storage and retrieval. On-line access for other users is provided through the National Library of Medicine's Medlars system.

System software: SSIE and NLM software packages

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, magnetic tapes, on-line access, administrative listings—Searches of the current file are available to individual investigators who contribute descriptions of their projects to the CCRESPAC file. These searches and SDI service are also provided to other centers in the ICRDB program, called CIDAC's, which provide publications of bibliographic abstracts. CCRESPAC input is used by CIDAC centers to help identify the current research focus in specific fields, to provide lists of investigators currently associated with specific subject areas. IARC also receives search results. Certain administrative listings are provided for use in various NCI programs. On-line access is provided on the CANCERPROJ file, a section of the CANCERLINE® system which is part of the National Library of Medicine's (NLM) MEDLINE® data base.

Publications: CCRESPAC regularly compiles and produces Special Listings of Current Cancer Research. Each listing, to be completed for approximately 60 specific subject areas, contains project descriptions arranged by subtopics, plus investigator, anticancer agent (if appropriate), and geographic location indexes.

AVAILABILITY:

Types of organizations served: National government agencies, international organizations, foreign organizations, colleges and universities, hospitals and other cancer centers

Access limitations: Restricted to certain user groups

User fees: None

Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

The Current Cancer Research Project Analysis Center is operated at the Smithsonian Science Information Exchange for the National Cancer Institute.

The active search file contains descriptions for projects initiated or initiated and completed during the present and past two years. About one-fifth of the file describes work taking place outside the United States, and the balance is obtained from domestic sources.

In addition to ongoing research project information, CCRESPAC compiles an on-line file of summaries of active clinical research protocols, CLINPROT. Like the CANCERPROJ file, CLINPROT is accessible through the National Library of Medicine's CANCERLINE® system. Clinical protocols have also been disseminated in published form.

The CANCERLIT section of the CANCERLINE® file at NLM provides bibliographic information about completed research work in the field. It is compiled through other centers in the ICRDB program.

1.4 DOCUMENTATION CENTER

Centro Internacional de Estudios Superiores de
Communicacion para America Latina
Avenido Amazonas 1521
Apartado Postal 584
Quito
Ecuador

Telephone: 236144 or 234031
Cable address: CIESPAL

System status: Operational system for documentation services initiated in 1970 in the planning stage for ongoing research information
Person responsible: MISS CARMEN CARRERA CARRILLO, Master of Library Science
Institutional affiliation:
International Center of Advanced Studies in Communications for Latin America
Centro Internacional de Estudios Superiores de Comunicacion para America Latina (CIESPAL)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International (Latin America, Spain, and Portugal)
Subject coverage: Communications research
Institutional coverage: National government agencies, other national organizations, international organizations

FILE DESCRIPTION:

Language of records: Spanish
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available for use by others) and Uniterm thesaurus
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: SDI services, statistical analyses of the data base
Publications: CIESPAL produces a publication containing abstracts of ongoing research projects three times a year; it is available for U.S. $12.00.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
Access limitations: Restricted to certain user groups
User fees: Yes
Descriptive material: Descriptive material in Spanish is available on request.

ADDITIONAL COMMENTS

CIESPAL is planning to produce several other types of publications in the future. These publications will include a directory of research institutions and a directory of investigators in Latin America, Spain, and Portugal who are concerned with research in communications. Funding would be obtained from the International Development Research Centre in Ottawa.

CIESPAL has also gathered information on 1,200 published documents in the field, and is producing a bibliography for them.

1.5 FID RESEARCH REFERRAL SERVICE (FID/RRS)

International Federation for Documentation
7 Hofweg
Postbus 30115
2500 AC The Hague
Netherlands

Telephone: 070–60 69 15

System status: Operational system initiated in 1971
Person responsible: MR. K. R. BROWN, Information Officer
Institutional affiliations:
International Federation for Documentation
Federation internationale de documentation (FID)

United Nations Educational, Scientific and Cultural Organization (Unesco)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International
Subject coverage: Information, documentation, and library science research
Institutional coverage: National government agencies, other national organizations, international organizations
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 350
New: 99% *Updated:* 1%
Number of records in active working file: 3,500
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: FID/RRS publishes bimonthly *R & D Projects in Documentation and Librarianship* (in print since January 1971). The current volume is Volume 7, ISSN 0301 4436. Subscriptions are D.Fl. 85.-/year. This serial contains descriptions of ongoing research projects in the field.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations
User fees: Fees are charged for the publication listed above; no fees are charged for other retrieval services.
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

Additional project information in varying degrees of detail is available from the system.

More information about FID/RRS may be found in the *FID News Bulletin,* Volume 25, No. 4, pp. 47–49 (1975) in an article by G. Janzing entitled "Registers of R&D Projects in Documentation and Librarianship: A Survey of International and National Efforts."

1.6 GENERAL EMBRYOLOGICAL INFORMATION SERVICE: AN INTERNATIONAL DIRECTORY OF CURRENT RESEARCH IN DEVELOPMENTAL BIOLOGY (GEIS)

Hubrecht Laboratorium
Universiteitscentrum "De Uithof"
Uppsalalaan 8
Utrecht
Netherlands

Telephone: 030–51 02 11

System status: Operational system initiated in 1949
Person responsible: DR. J. FABER, Editor
Institutional affiliations:

Hubrecht Laboratory
Hubrecht Laboratorium

International Embryological Institute
Internationale Embryologisch Instituut

Royal Netherlands Academy of Arts and Sciences
Koninklijke Nederlandse Akademie van Wetenschappen (KNA W)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International
Subject coverage: Developmental biology of invertebrates, vertebrates, man, plants, and unicellular organisms including embryology, metamorphosis, regeneration, asexual reproduction, postnatal development, developmental pathology, experimental teratogenesis, developmental genetics, and related research

Institutional coverage: Institutions performing research in developmental biology such as institutes and laboratories of universities, government agencies, academies, industries
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 1,500
New: 15% *Updated:* 85%
Number of records in active working file: 3,000
Frequency of updating: Biennial
Language of records: English predominantly, plus some French and German
Data elements included: Project title, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available under certain conditions for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files—All information in the manual files appears in printed volumes.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file in exceptional cases only
Publications: The Hubrecht Laboratory regularly publishes a directory containing ongoing research information. The biennial publication is entitled: *General Embryological Information Service: (An International Directory of Current Research in Developmental Biology)* (Utrecht, Netherlands: Hubrecht Laboratory). Volume 16, which covers 1975 and 1976, is D.Fl. 70.-, U.S. $28.00. Each volume consists of two parts: Part 1 containing data on Europe is published in odd years, and Part 2 containing data on countries outside Europe in even years. The directory contains the names of research workers, their addresses, the topics of their research, and a listing of institutes with members engaged in developmental biology research.

AVAILABILITY:

Types of organizations served: Research institutes, universities
User fees: Fees are charged for the publication listed above; no fees are charged for other retrieval services.
Descriptive material: A brochure in English is available on request.

ADDITIONAL COMMENTS

This service, cooperating with the International Society of Developmental Biologists, assembles and indexes the current research activity of about 3,000 developmental biologists from all over the world who submit data. In addition to an alphabetical listing of researchers and their projects and a geographic directory of concerned organizations, the service annually prepares close to 100 notices on books in all areas of developmental biology.

1.7 INDEX OF CURRENT RESEARCH IN ARID ZONE ECOLOGY
INDICE DE ESTUDIOS EN DESARROLLO EN ECOLOGIA DE ZONAS ARIDAS

Instituto de Investigaciones sobre
Recursos Bioticos A.C.
Heroico Colegio Militar No. 7
Apartado Postal 63
Jalapa, Veracruz
Mexico

Telephone: 774–69

System status: Operational system established in 1977
Person responsible: DR. ARTURO GOMEZ-POMPA, General Director
Institutional affiliations:

Institute for Investigation of Biological Resources
Instituto de Investigaciones sobre Recursos Bioticos A.C. (INIREB)

National Council of Science and Technology
Consejo Nacional de Ciencia y Tecnologia (CONACYT)

Man and the Biosphere Programme (MAB)

United Nations Educational, Scientific and Cultural Organization (Unesco)

Organization of American States (OAS)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International
Subject coverage: Arid zone ecology research
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 156
New: 100% *Updated:* 0%
Number of records in active working file: 156
Frequency of updating: Annual
Language of records: Spanish, English, and French
Data elements included: Project title, project objectives, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, subject descriptors or keywords, bibliographic references, suggestions or additional information, country and region where research is carried out

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files, punched cards

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: INIREB's Computerized Information Unit *(Unidad Informativa Computable) (UNICOM)* compiles the *Index of Current Research in Arid Zone Ecology* in published form. The 1977 edition is in press.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
User fees: Yes

1.8 INDEX OF CURRENT TROPICAL ECOLOGICAL RESEARCH
INDICE DE PROYECTOS EN DESARROLLO EN ECOLOGIA TROPICAL

Instituto de Investigaciones sobre
Recursos Bioticos A.C.
Heroico Colegio Militar No. 7
Apartado Postal 63
Jalapa, Veracruz
Mexico

Telephone: 774–69

System status: Operational system established in 1975
Person responsible: DR. ARTURO GOMEZ-POMPA, General Director
Institutional affiliations:

Institute for Investigation of Biological Resources
Instituto de Investigaciones sobre Recursos Bioticos A.C. (INIREB)

National Council of Science and Technology
Consejo Nacional de Ciencia y Tecnologia (CONACYT)

Man and the Biosphere Programme (MAB)

United Nations Educational, Scientific and Cultural Organization (Unesco)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International
Subject coverage: Tropical ecology research
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 505
New: 30% *Updated:* 70%
Number of records in active working file: 655
Frequency of updating: Annual

80

Language of records: Spanish, English, French, and Portuguese
Data elements included: Project title, project objectives, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available for use by others)
Source of subject indexing: Author/investigator

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files, punched cards

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: INIREB's Computerized Information Unit *(Unidad Informativa Computable) (UNICOM)* compiles the *Index of Current Tropical Ecological Research* in published form. Volume I was published in 1975 and Volume II is currently in press. Project descriptions in the publication are indexed according to authors and keywords. Indexes include a geographical index of authors, a general author's index, and a keyword index in Spanish.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
User fees: Yes

1.9 INTERNATIONAL CO-OPERATION IN THE FIELD OF TRANSPORT ECONOMICS (ICTED)
COOPERATION INTERNATIONALE EN MATIERE DE DOCUMENTATION SUR L'ECONOMIE DES TRANSPORTS (CIDET)

19, rue de Franqueville
75775 Paris Cedex 16
France

Telephone: 524–97–22
Telex: COMINTRANS PARIS 611040
Cable address: MINISTRANS PARIS

System status: Operational system initiated in 1969
Person responsible: MRS. P. COQUAND, Chef de la section documentation

Institutional affiliation:
European Conference of Ministers of Transport (ECMT)
Conference europeenne des ministres des transports (CEMT)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International—ECMT member and associated member countries (Austria, Belgium, Denmark, the Federal Republic of Germany, France, Greece, Ireland, Italy, Luxembourg, the Netherlands, Norway, Portugal, Spain, Sweden, Switzerland, Turkey, the United Kingdom, and Yugoslavia, Members; Japan and Australia, Associate Members; Canada and the United States, Observers)
Subject coverage: Transport economics
Institutional coverage: National government agencies, other national organizations, international organizations, research institutions, private firms and consultants
Source of input: Performing organizations, supporting organizations—ICTED also receives input from the International Road Research Documentation (IRRD) program and from the Transportation Research Board (TRB) in Washington, D.C.

FILE DESCRIPTION:

Number of records processed annually: 1,000
New: 40% *Updated:* 60%
Number of records in active working file: 1,000
Frequency of updating: Semiannual
Language of records: French, English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)—Broad subject areas only are indexed.
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy (machine-readable input is planned)
Processing and storage methods: Computerized system operating in batch mode with a Burroughs 6700 central processing unit and disk processing and storage capabilities
System software: AUTODOC (OECD software, available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file (planned), statistical analyses of the data base (planned), magnetic tapes (planned)

Publications: ICTED produces the biannual bulletin *Research on Transport Economics* in May and November each year (Paris: European Conference of Ministers of Transport, ISSN 0304 3320, U.S. $30.00/year). The bulletin is the primary means for disseminating the information about ongoing research in the field in the ICTED files. The May edition contains information about new projects for the year, while the November issue presents a general review of new and continuing research activities. The bilingual (French and English) bulletins include, in addition to project descriptions, indexes for subjects, authors, and supporting and performing organizations.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations

Access limitations: Restricted to certain user groups

User fees: None for ECMT members and associated members; as published for others

Descriptive material: Descriptive brochures in English, French, and German are available on request.

ADDITIONAL COMMENTS

In addition to the ongoing research projects file, ICTED is producing a general file of references for published reports, books, journal articles, theses, and other documentation in the field of transport economics policy, planning, and sociology. This information is available to users in magnetic tape format.

1.10 INTERNATIONAL DIRECTORY OF APPLIED RESEARCH FOR THE PROTECTION MAN AT WORK

REPERTOIRE INTERNATIONAL DES RECHERCHES APPLIQUEES A LA PROTECTION DE L'HOMME AU TRAVAIL

Secretariat du comite de l'AISS pour la recherche
Institut national de recherche et de securite
30, rue Olivier Noyer
75680 Paris Cedex 14
France

Telephone: 545-67-67

System status: Operational system initiated in 1971

Person responsible: MRS M THANH, Chef, Service de documentation

Institutional affiliations:

National Research and Safety Institute
Institut national de recherche et de securite (INRS)

International Social Security Administration (ISSA)
Association internationale de la securite sociale (AISS)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International—Coverage is provided for 37 countries, including the countries of Eastern Europe.
Subject coverage: Physics, engineering, electronics, materials technology, medical sciences, psychology, sociology, and ergonomics research relevant to the prevention of occupational risks and to the improvement of working conditions
Institutional coverage: National government agencies, other national organizations, and scientific and technical research centers of trade associations, industrial companies, and universities
Source of input: Performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records in active working file: 2,800 (three-year period)
Frequency of updating: Every three years
Language of records: French, English
Data elements included: Project title, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, indication of ongoing or planned research project, performing organization legal status and funding and year of foundation, name of persons in charge, staff, aims and activities, noteworthy equipment, publications

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title and text—Projects are indexed according to 30 broad classifications in the field of occupational safety and health and improvement of working conditions.
Source of subject indexing: Indexing staff with and without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy—A trilingual (French, English, German) questionnaire is sent to contributing organizations every three years.
Processing and storage methods: Manual files and punched cards

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service
Publications: INRS periodically publishes the results of an international survey of organizations active in the field of research on occupational safety and health in an international directory. The current edition contains the results of the 1976 survey, and contains more specific information about research projects

than the two previous editions, which concentrated on research organizations. The *Repertoire international des recherches appliquees a la protection de l'homme au travail* (Paris: Institut national de recherche et de securite, June 1977, ISBN 2 85599 000 9, 3rd edition, 200 F domestic, 300 F foreign) was also published in English under the title *International Directory of Applied Research for the Protection of Man at Work* (Paris: Institut national de recherche et de securite, July 1977, ISBN 2 85599 001 7, 2nd edition, 300 F domestic, 400 F foreign).

The *Repertoire* includes responses from 268 organizations in 37 countries active in the field. Descriptions of both ongoing and planned research projects are presented under 30 broad subject headings. In addition, profiles of research organizations that include the name, address, telephone number, legal status, funding, year established, directors, total staff, research staff, aims, sectors of activity, research themes, noteworthy equipment, and publications form part of the text. Indexes, including a keyword index, are also compiled.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, private companies

User fees: Fees are charged for the publications listed above; no fees are charged for other retrieval services.

Descriptive material: Descriptive material in English and French is available on request.

ADDITIONAL COMMENTS

INRS serves the International Section of ISSA for research on prevention of occupational risks by assisting in the accomplishment of the section's goals of learning about and making known ongoing or planned research in the field, facilitating international cooperation and exchange, and providing opportunities to promote international coordination of research efforts.

Publication of the *Repertoire* was begun in 1971, and continues in a more detailed fashion with the current third edition.

1.11 INTERNATIONAL INFORMATION CENTRE FOR TERMINOLOGY (Infoterm)
INTERNATIONALES INFORMATIONSZENTRUM FUER TERMINOLOGIE (Infoterm)

Austrian Standards Institute
Leopoldsgasse 4
Postfach 130
1021 Vienna 2
Austria

Telephone: (0222) 33 55 19/35,36,37
Telex: 07/5960
Cable address: AUSTRIANORM

System status: Planning stage, initiated in 1975
Person responsible: MR. HELMUT FELBER, Director
Institutional affiliations:
Austrian Standards Institute
Oesterreichisches Normungsinstitut (ON)

Federal Ministry of Building and Engineering
Bundesministerium fuer Bauten und Technik (BMfBuT)

Federal Chamber of Commerce
Bundeskammer der gewerblichen Wirtschaft (Buka)

United Nations Educational, Scientific and Cultural Organization (Unesco) (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International
Subject coverage: Terminology in all fields of scientific research
Institutional coverage: National government agencies, other national organizations, international organizations
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records in active working file: 278
Language of records: English, French
Data elements included: Project title, project objectives, project methodology or approach, progress reports, principal investigator, performing organization name, performing organization address, project start date and end date, contract, grant, or project number assigned, subject descriptors or keywords, bibliographic references, languages covered, type of project, status of project, number of staff, scope of project, sources used, data availability in machine-readable form, data availability for outside users, training and teaching possibilities, references to individuals/organizations

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary—UDC subject classification is used.
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy or machine-readable form, depending on source of input
Processing and storage methods: Manual files and computerized system with magnetic tape storage and processing capabilities
System software: Terminologie-Erfassungs- und Auswertungs-Methode (Terminology Registration and Evaluation Method or TEAM) (available from Siemens under certain conditions for use by others)—This software is currently in use for processing bibliographic information, and its application to project information is in progress.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: Infoterm is including in its series of publications, Infoterm Series, one volume entitled *Infoterm Series 4, World Guide to Terminological Activities* (in press) that serves as a directory for identifying terminological commissions, terminological documentation centers, terminological data banks, and the like throughout the world. Incidental project information is contained in the directory descriptions.

Information about the current projects of Infoterm itself is included in the *Infoterm Newsletter,* which is published as part of *Lebende Sprachen,* a periodical in the field.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations, nonprofit organizations, individuals
User fees: None at present
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

As part of the UNISIST programme of Unesco, Infoterm is engaged in the development of an international network in the field of terminology, TermNet. Plans are underway to arrange a network of terminology preparing bodies and terminology documentation centers, with Infoterm serving as an international coordinating agency.

Infoterm has already begun the task of collecting and disseminating information about bibliographic materials in the field, and has published preliminary results in Infoterm Series issues. Under the planned network, participating organizations would provide documentation center services in various specialized areas of interest, decentralizing the documentation task.

Infoterm staff also provide consultancy services to interested organizations and individuals in the field, as well as coordinating and sponsoring training courses and seminars.

1.12 INTERNATIONAL INFORMATION NETWORK ON DEVELOPMENT RESEARCH (IINDR)
RESEAU INTERNATIONAL D'INFORMATION SUR LA RECHERCHE EN MATIERE DE DEVELOPPEMENT

Centre de developpement
OCDE
94, rue Chardon-Lagache
75016 Paris Cedex
France

Telephone: 524–82–00
Telex: 62.160 OCDE PARIS
Cable address: DEVCENTRE

System status: Developmental stage, initiated in 1977
Person responsible: DR. GIULIO FOSSI

Institutional affiliations:
Development Centre (DC)
Centre de developpement (CD)

Organisation for Economic Co-operation and Development (OECD)
Organisation de cooperation et de developpement economiques (OCDE)

DEVSIS (planned)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International (OECD Member Countries, plus nonmember countries in Africa, Asia, and the Pacific)—Countries in Eastern Europe and China are not included.
Subject coverage: Developmental research, primarily in the social sciences and interdisciplinary areas
Institutional coverage: National organizations other than national government agencies, international organizations, social science research units, development research institutes
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Language of records: English, French, Spanish
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, project funding, subject descriptors or keywords, bibliographic references, performing organization telephone numbers, cooperating research institutes, planned output and type of distribution, geographic area, language used

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files, punched cards, and a computerized system operating in batch mode with magnetic tape processing and storage capabilities
System software: AUTODOC (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base, magnetic tapes

Publications: IINDR has prepared inventories of ongoing research information for inclusion in the following OECD Development Centre publications:

"Directory of Social Science Research and Training Units: Africa," *Liaison bulletin* 1975:2 (Paris, U.S. $2.00);

"Directory of Social Science Research and Training Units: Asia," *Liaison bulletin* 1975:3–4 (Paris, $4.00);

"Directory of Social Science Research and Training Units: Latin America," *Liaison bulletin* 1976:1–2 (Paris, $4.00); and

"Directory of Research and Training Institutes in the Field of Economic and Social Development: OECD Member Countries," *Liaison Bulletin* 1976:3–4 (Paris).

An experimental issue of the bulletin that will contain information about ongoing research in the field in those European countries not covered by a national directory is in preparation.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, research institutes

User fees: Yes

1.13 INTERNATIONAL INFORMATION SYSTEM ON RESEARCH IN DOCUMENTATION (ISORID)

SYSTEME INTERNATIONAL D'INFORMATION SUR LA RECHERCHE EN DOCUMENTATION

Division of the General Information Programme
Unesco
7, place de Fontenoy
75700 Paris
France

Telephone: 577-16-10
Telex: 204461 PARIS
Cable address: UNESCO PARIS

System status: Operational system initiated in 1971
Person responsible: DR V TARABOI, Chief, Studies, Research and Publication Section
Institutional affiliations:

Division of the General Information Programme (PGI)

United Nations Educational, Scientific and Cultural Organization (Unesco)
Organisation des Nations Unies pour l'education, la science et la culture

International Federation for Documentation
Federation internationale de documentation (FID)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International (Unesco Member States)
Subject coverage: Information science, documentation, and library science research
Institutional coverage: National government agencies, other national organizations, international organizations
Source of input: National Information Transfer Centres (NITC's) in Member States, and the FID

FILE DESCRIPTION:

Number of records processed annually: 150 from NITC's, 350 from FID
New: 85%-90% *Updated:* 15%-10%
Number of records in active working file: 900 from NITC's, 1,300 from FID
Frequency of updating: Varies according to individual NITC's policies
Language of records: English, French
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others in 1978)—The Unesco thesaurus used is a classified, alphabetical, permuted, hierarchical scheme.
Source of subject indexing: Indexing staff with some scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form (planned)
Processing and storage methods: Manual files and a computerized system operating on-line with an IBM 370/145 central processing unit; Delta 5500, Memorex 1377, and IBM 3277-2 video display terminals; ten IBM 3440 disk packs; and five magnetic tape units
System software: CDS/ISIS (available under certain conditions for use by others)—ISIS was originally developed by the International Labour Organization (ILO) and has been substantially modified by Unesco. CDS/ISIS is available through Unesco. The operating system is OS/VS1 with CICS. These software packages are used for ISORID, DARE, and the CARIS program in Paris.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, on-line access (in-house only)—Retrieval services are provided as manpower and facilities permit.
Publications: ISORID disseminates information about ongoing research projects, and about research reports and other published material, primarily through the bimonthly periodical *Bibliography,*

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Documentation, Terminology (Paris: Unesco Press, ISSN 0523 2821, 15 francs). Each issue contains a register of new ISORID entries for ongoing research projects and published research reports. A cumulative index by country, project or report title, and subject is published once a year.

AVAILABILITY:

Types of organizations served: In Member States, national government agencies, other national organizations, other specialists; international organizations
Access limitations: Restricted to certain user groups
User fees: Fees are charged for the publication listed above; no fees are charged for other retrieval services.
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

ISORID collects, processes, analyzes, and disseminates data on activities and research efforts concerning information, documentation, libraries, and archives. Data collection is decentralized and is accomplished by the National Information Transfer Centres in Member States.

In addition to ongoing research information in the field, ISORID includes information about research reports and other bibliographic materials in its files. Copies of progress reports and other research results are available at the Unesco library in Paris.

Searches of the ISORID data base to identify information about persons or organizations working in a specific field of documentation research will be available in the future.

1.14 INTERNATIONAL REFERENCE CENTER FOR THE STUDY OF PSYCHOTROPIC DRUGS (IRC)

National Institute of Mental Health
5600 Fishers Lane, Room 9C-14
Rockville, Maryland 20852
United States of America

Telephone: (301) 443-3549

System status: Operational system initiated in 1968
Person responsible: DR. ALICE A. LEEDS, Chief
Institutional affiliations:

National Institute of Mental Health, Alcoholism, Drug Abuse, and Mental Health Administration (NIMH) (principal funding organization)

National Institutes of Health (NIH)

United States Public Health Service (PHS)

Alcoholism, Drug Abuse, and Mental Health Administration (ADAMHA)

United States Department of Health, Education, and Welfare (DHEW)

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World Health Organization (WHO)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International
Subject coverage: Medical sciences research in psychopharmacology
Institutional coverage: National government agencies, international organizations (NIMH and the World Health Organization in Geneva, Switzerland)
Source of input: Performing organizations (25 centers throughout the world)

FILE DESCRIPTION:

Number of records in active working file: 2,200
Frequency of updating: Not requested regularly
Language of records: English—Foreign language records are translated into English and then added to system.
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)—New terms are added as necessary and as collaboratively determined by the 25 worldwide centers.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: IRC produces two publications that contain information about ongoing research:

Psychopharmacology Bulletin (quarterly)—Periodic issues of the bulletin contain detailed descriptions of research projects in the field that are sponsored by NIMH. The bulletin also includes news about IRC activities, international activities, reviews of latest papers and books, and abridged proceedings of conferences and symposia in the field. It can be ordered from the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402, U.S.A. for U.S. $5.75/year domestic, $7.30/year foreign;

International Directory of Investigators in Psychopharmacology (first edition, 1972)—The directory contains short biographical resumes for 2,200 professionals who are actively engaged in or responsible for psychotropic drug research. It was published by NIMH and WHO, and contains, in addition to the resumes, geographic, research activity, and major field indexes. Each entry contains a few sentences describing the major research interests for each investigator. The directory is expected to be updated shortly.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, individual investigators

User fees: Fees are charged for the publications listed above; no fees are charged for other retrieval services.

Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

In addition to the profiles of individual researchers and descriptions of NIMH research projects, IRC maintains a drug index containing approximately 1,000 records for newest information about psychotropic drugs used for treatment of mental illnesses. The index contains details about the drug itself, such as its chemical structure, plus lists of indications and contraindications, dosages, concomitant effects, and comments submitted from researchers about their experiences with the drug. This index information is updated as it is received, and then disseminated in hard copy form to participating centers in the program.

1.15 INTERNATIONAL REGISTER OF RESEARCH ON BLINDNESS AND VISUAL IMPAIRMENT

Warwick Research Unit for the Blind
University of Warwick
Coventry CV4 7AL
United Kingdom

Telephone: 0203 24011
Telex: 31406

System status: Operational system initiated in 1975
Person responsible: DR. J. M. GILL
Institutional affiliations:

Warwick Research Unit for the Blind (WRUB)

University of Warwick

American Foundation for the Blind (AFB) (principal funding organization)

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DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International
Subject coverage: Nonmedical and innovative practice for the blind and visually impaired involving research in engineering, computer sciences, electronics, biology, demography, economics, education, psychology, and sociology
Institutional coverage: National government agencies, international organizations, and any other groups that work in the field
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 825
New: 50% *Updated:* 50%
Number of records in active working file: 825
Frequency of updating: Twice daily
Language of records: English
Data elements included: Project title, general project summary, principal investigator, coinvestigators, performing organization name, performing organization address, subject descriptors or keywords, languages known by research worker, modes of communication for correspondence such as braille, inkprint, audiotape

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff with scientific background—The indexing system is currently being revised to improve retrieval and compatibility with systems in other countries.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Direct input on a video display unit—Information is stored in ISO format on 9 track, 800 bpi, NRZI magnetic tapes. An RXDS Sigma 5 computer (32K bytes of storage) is used. Output is on a high-speed printer, and, if needed, on a special braille embosser.
System software: Custom software packages are available for use by others and include a program to output in contracted braille for blind scientists.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, magnetic tapes
Publications: WRUB biennially publishes the *International Register of Research on Blindness and Visual Impairment* compiled by J. M. Gill and L. L. Clark containing ongoing research information

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(£5.- for those who can obtain negotiable currency, free of charge to others). A limited number of braille copies are available (price on application).

A new edition with greater coverage is in preparation. It will be produced in hard copy, as well as grade 1 and grade 2 braille, and may be translated into other languages.

The first section of the register contains the names, addresses, and brief descriptions of projects of those who are working in the natural, behavioral, and technological sciences bearing on problems arising from visual impairment. This register does not include purely medical research, but it does aim to include research on the causes of blindness, work with extremely low vision patients. sight restoration and management, and referral of patients who are undergoing deterioration of visual capacity. The second section of the register includes: abbreviations of the names and organizations concerned with research for the blind and visually impaired; periodicals which sometimes include relevant articles with significant research content; abstract journals, information services, and data bases which claim to cover some, or all, of this field; and a brief list of some standard reference books.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations, foreign organizations
Access limitations: Restricted to certain user groups
User fees: None

ADDITIONAL COMMENTS

WRUB plans to participate in an international network of information systems in the field that will include the American Foundation for the Blind in New York and the National Conservatory of Arts and Crafts *(Conservatoire national des arts et metiers)* in Paris.

1.16 INTERNATIONAL ROAD RESEARCH DOCUMENTATION (IRRD) *DOCUMENTATION INTERNATIONALE DE RECHERCHE ROUTIERE (DIRR)*

Programme de recherche routiere
OCDE
2, rue Andre-Pascal
75775 Paris Cedex 16
France

Telephone: 524-82-00
Telex: 62.160 OCDE PARIS
Cable address: DEVELOPECONOMIE

System status: Operational system initiated in 1965
Person responsible: MR G LORIDAN, Administrateur
Institutional affiliations:
Road Research Programme
Programme de recherche routiere

Organisation for Economic Co-operation and Development (OECD)
Organisation de cooperation et de developpement economiques (OCDE)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International—IRRD member countries (Australia, Austria, Belgium, Canada, Denmark, the Federal Republic of Germany, France, Ireland, Japan, the Netherlands, Norway, Portugal, Spain, Sweden, Switzerland, the United Kingdom, and the United States)

Subject coverage: Roads and road transport research

Institutional coverage: National government agencies, other national organizations, international organizations, institutes

Source of input: Individual scientists, performing organizations, supporting organizations—IRRD collects ongoing research information from three primary sources: IRRD member countries report data on survey forms to the English Co-ordinating Centre for IRRD, the Transport and Road Research Laboratory (TRRL) in Crowthorne, United Kingdom; United States information is forwarded to TRRL by the Transportation Research Board (TRB) in Washington, D.C.; ongoing research information for non-IRRD member countries is obtained from the International Road Federation (IRF) in Washington, D.C., as well as from the Transportation Research Board.

FILE DESCRIPTION:

Number of records processed annually: 1,500–2,000

New: 50% *Updated:* 50%

Number of records in active working file: 5,000

Frequency of updating: Every three years (however, new project information is collected annually)

Language of records: English, French, German

Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, record status, record source, updating status

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)—Terms are selected from the IRRD trilingual thesaurus (English, French, or German).

Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy or magnetic tape

Processing and storage methods: Ongoing research information in the IRRD system is processed by the Transport and Road Research Laboratory (TRRL) in Crowthorne, United Kingdom, which is the English Co-ordinating Centre for the system. All Survey Forms for ongoing research are translated into English, and processed into the TRRL computerized system. TRRL uses an ICL 4/70 computer with card punch and OCR access and magnetic tape storage.

System software: Custom TRRL software

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, magnetic tapes, on-line access

Publications: Ongoing research information collected in the IRRD system appears annually in the *World Survey of Current Research and Development on Roads and Road Transport* published by the International Road Federation (IRF).

IRRD contributes information about ongoing research in the field of transport economics to the International Co-operation in the Field of Transport Economics (ICTED) program, which subsequently publishes it in a semiannual bulletin, *Research on Transport Economics.*

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations

User fees: Each IRRD member country decides its own policy with respect to fees.

Descriptive material: Descriptive brochures in French, English, Spanish, and German are available on request.

ADDITIONAL COMMENTS

In addition to ongoing research information IRRD collects and disseminates information on published and unpublished reports and articles, serial and nonserial publications, books, conference proceedings, standards, patents, and computer programs in roads and road transport research.

1.17 INTERNATIONAL SPECIALIZED INFORMATION SYSTEM FOR RESEARCH AND DEVELOPMENT (ISIS R&D)

International Centre for Scientific and
Technical Information
Kuusinena 21-b
125252 Moscow
Union of Soviet Socialist Republics

Telephone: 198–70–21
Telex: 7525
Cable address: Moscow, A-252, MTs NTI

System status: Operational system initiated in 1973
Person responsible: PROF. L. N. SUMAROKOV, ICSTI Director
Institutional affiliations:

International Centre for Scientific and Technical Information (ICSTI)

International Scientific and Technical Information System (ISTIS)

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ADDITIONAL COMMENTS

ISIS R&D is a specialized subsystem of the International Scientific and Technical Information System (ISTIS). It is designed for the collection, processing, and distribution to national centers of bibliographic information on completed research. But, because ISIS R&D cooperates closely with national information systems for research and development in the ISTIS member countries, many of which do operate national ongoing research information systems, it encourages efforts toward unification of processing techniques, classification structures, and record formats, the results of which are relevant to the operation of ongoing research information systems as well.

ICSTI conducts studies of organizational, legal, and methodological aspects of information system design, for which purpose it collects and processes information about research and development projects planned and in progress under the Council for Mutual Economic Assistance (CMEA) multilateral cooperation programs.

1.18 LEICESTER DOCUMENTATION CENTRE FOR MASS COMMUNICATION RESEARCH

Centre for Mass Communication Research
University of Leicester
104 Regent Road
Leicester LE1 7LT
United Kingdom

Telephone: 0533 28437

System status: Operational system initiated in 1969

Persons responsible: PROF. J. D. HALLORAN, Director
MRS. CONNIE ELLIS, Research Assistant

Institutional affiliations:

Centre for Mass Communication Research (CMCR)

University of Leicester

United Nations Educational, Scientific and Cultural Organization (Unesco) (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International coverage including Britain, Australia, New Zealand, the Middle East, the West Indies, English-speaking Africa, and—to a lesser extent—Canada, which provides material through its national center

Subject coverage: Mass communications and mass media research covering specifically television, radio, the press, cinema, films, publishing, music, and also the influence of mass communications on politics, education, economics, attitudes and beliefs, advertising, and development in the Third World

Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations, regional documentation centers, universities, polytechnics, the British Film Institute, the British Broadcasting Company, the Independent Broadcasting Authority, and Independent Television

FILE DESCRIPTION:

Frequency of updating: Annual
Language of records: Mainly English
Data elements included: Project title, general project summary, principal investigator, performing organization name, project start date and end date, supporting organization name

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Indexing by broad subject areas only (available for use by others)
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: Copies of the following publication containing ongoing research information are available: *Current British Research on Mass Media and Mass Communication—Register of Ongoing and Recently Completed Research, June 1976* (to be produced annually, £2.- outside the United Kingdom).

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations, foreign organizations
User fees: Some fees are charged for publications; no fees are charged for other retrieval services.
Descriptive material: A prospectus in English is available on request.

ADDITIONAL COMMENTS

The Leicester Documentation Centre for Mass Communication was set up by the Centre for Mass Communication Research, University of Leicester in cooperation with Unesco as one of six centers throughout the world whose purpose it is to collect and disseminate published and unpublished material on mass communications research within its regional area. The area covered by the Leicester Documentation Centre includes the United Kingdom, Australia, New Zealand, the Middle East, the West Indies, English-speaking Africa, and—to a lesser extent—Canada, which forwards material from its national center, the Canadian Communications Research Information Centre in Ottawa. Other areas are served by AMIC, Singapore, covering the Asian region; CIESPAL, Quito, Ecuador, covering Latin America; and CIESJ, Strasbourg, France, serving France and the Federal Republic of Germany. NORDICOM, covering Scandinavia, has four national centers in Bergen (Norway), Stockholm (Sweden), Tampere (Finland), and Aarhus (Denmark). CEKOM, which is situated in Krakow, Poland, covers the

Eastern European region. (It is possible that other centers will be established in the Federal Republic of Germany, the Netherlands, an Arabic-language country, and the United States.) The centers collaborate with each other in exchanging information on mass communications research, and in this way it is hoped that the centers will be capable of monitoring and disseminating information about all-important mass communications research throughout the world.

The Leicester center has three main tasks: Collecting unpublished and "fugitive" material; collecting published material; and compiling a register of ongoing and recently completed mass communications research within the British Isles. Photocopies of unpublished and "fugitive" material are available subject to authors' discretion on request (fees charged at cost). A list of *Recent Books on Mass Media with British Imprints* was produced in 1976 to cover published materials; current plans include issuing new lists regularly. The first register of ongoing research projects described above was produced in 1974, and future editions will be published annually. Similar registers are planned to cover ongoing research in Australasia, Africa, and Canada.

1.19 TECHNICAL INFORMATION AND LIBRARY SERVICES

Transport and Road Research Laboratory
Crowthorne, Berkshire RG11 6AU
United Kingdom

Telephone: 034 46 3131
Telex: 848272

System status: Operational system initiated in 1967
Person responsible: MRS. P. E. MONGAR, Head
Institutional affiliations:
Transport and Road Research Laboratory (TRRL)

Department of the Environment (DOE)

Department of Transport (DTp)

International Road Research Documentation (IRRD)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International
Subject coverage: Roads and road transport research
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations, industry, universities, and private consultants
Source of input: Performing organizations—TRRL acts as the English Co-ordinating Centre for the International Road Research Documentation (IRRD) system. As such, it receives input from IRRD member countries, from the Transportation Research Board (TRB) and the International Road Federation (IRF) in Washington, D.C., and from performing organizations in the United Kingdom for processing and input to the IRRD files.

FILE DESCRIPTION:

Number of records processed annually: 2,000–3,000
New: 30% *Updated:* 70%
Number of records in active working file: 7,000
Frequency of updating: Annual for United Kingdom projects, every three years for other projects (however, new project information from outside the United Kingdom is added each year)
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, record status (for overseas projects), record source (for overseas projects), updating status, performing organization telephone, telex, and cable address (for United Kingdom projects), special equipment or facilities (for United Kingdom projects), potential applications or beneficiaries (for United Kingdom projects)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)—Terms from the IRRD trilingual thesaurus (English, French, German) are used.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form
Processing and storage methods: Computerized system operating in batch mode with an ICL 4/70 central processing unit, card punch machines, optical character readers, and magnetic tape processing and storage
System software: Custom TRRL software

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service (in-house only), magnetic tapes
Publications: TRRL compiles information about United Kingdom research in the field for the *DOE/DTp Register of Research, Part III Roads and Transport* annually. This publication, ISBN 07184 00402 (1976), is distributed free of charge. Project descriptions are accompanied by subject, investigator, performing organization, and supporting organization indexes. A list of performing organization addresses and telephone numbers is also presented.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations, consultants, research workers
User fees: None

ADDITIONAL COMMENTS

As the English Co-ordinating Centre for the IRRD, TRRL also includes in its data base information about published and unpublished reports and articles, serial and nonserial publications, books, conference proceedings, standards, patents, and computer programs in roads and road transport research. Additional information about TRRL's own research projects is also available.

1.20 TECHNICAL INFORMATION CENTER (TIC)

National Clearinghouse for
Smoking and Health
Bureau of Health Education
Center for Disease Control
Building 14, Room SB-1
1600 Clifton Road, N.E.
Atlanta, Georgia 30333
United States of America

Telephone: (404) 633–3311, extension 3235

System status: Operational system initiated in 1966
Person responsible: MR. DONALD R. SHOPLAND, Technical Information Officer
Institutional affiliations:

National Clearinghouse for Smoking and Health (NCSH)

Bureau of Health Education

Center for Disease Control (CDC)

United States Public Health Service (PHS)

United States Department of Health, Education, and Welfare (DHEW) (principal funding organization)

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DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International (37 countries in 1976)

Subject coverage: Chemical, biological, medical, educational, and psychological research pertaining to smoking, tobacco, and health

Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations

Source of input: Individual investigators

FILE DESCRIPTION:

Number of records processed annually: 1,000

New: 60% *Updated:* 40%

Number of records in active working file: 1,000

Frequency of updating: Biennial

Language of records: English

Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available under certain conditions for use by others)—Fixed primary and modifying secondary phrases are assigned.

Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files—Some automated processing is used for text production and assembly of indexes for the publication described below.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services of this file are provided beyond production of the publication described below.

Publications: Under contract with Herner and Company in Washington, D.C., NCSH surveys the international research community and publishes the *Directory of On-Going Research in Smoking and Health* every two years. The latest edition in 1976 included 869 descriptions of projects active in 37 countries, 446 from the United States and 423 from other countries. The directory is distributed free of charge, and is DHEW Publication No. (CDC) 76–8320. In addition to project descriptions, the directory includes indexes for principal investigators, performing organizations, sponsors, and subjects.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, individuals
User fees: None
Descriptive material: The directory itself and other publications on smoking and health are available from NCSH free of charge.

ADDITIONAL COMMENTS

In addition to ongoing research information, NCSH collects and processes approximately 1,400 bibliographic citations to literature in the field of smoking and health each year.

Other publications available from the clearinghouse include:
Smoking and Health Bulletin (about 10 issues/year);
Health Consequences of Smoking (annual);
Bibliography on Smoking & Health (annual);
State Legislation on Smoking & Health 1976 (annual);
Adult Use of Tobacco 1975 (issued every four or five years);
Teenage Smoking (biennial); and
special publications (issued as needed).

1.21 UNESCO COMPUTERIZED DATA RETRIEVAL SYSTEM FOR DOCUMENTATION IN THE SOCIAL AND HUMAN SCIENCES (DARE)
SYSTEME DE DEPISTAGE AUTOMATIQUE DES DONNEES POUR LES SCIENCES SOCIALES ET LES SCIENCES HUMAINES DE L'UNESCO

Social Science Documentation Centre
Unesco
7, place de Fontenoy
75700 Paris
France

Telephone: 577-16-10
Telex: 204461 PARIS
Cable address: UNESCO PARIS

System status: Operational system initiated in 1968
Person responsible: MISS ESTER M. RONQUILLO, Programme Specialist
Institutional affiliations:
Social Science Documentation Centre (SSDC)

United Nations Educational, Scientific and Cultural Organization (Unesco)
Organisation des nations unies pour l'education, la science et la culture

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International (Unesco Member States)

Subject coverage: Anthropology, demography, economics, education, political science, psychology, sociology, law, administrative science, and social welfare research—Coverage is slanted towards mission-oriented fields such as peace, human rights, developmental studies, environment, and quality of life studies, socioeconomic analysis, population, drug abuse, women and youth. These subject areas correspond roughly to Unesco programs and administrative structures as approved by the General Conference.

Institutional coverage: National government agencies, other national organizations, international organizations, regional organizations, private organizations

Source of input: Performing organizations, supporting organizations—Member States are encouraged to coordinate and process their national information through a single national focal point linked to the General Information Programme. However, Unesco is also in direct contact with institutions in Member States.

FILE DESCRIPTION:

Number of records processed annually: 100 records containing full project information are processed annually. Titles only for 2,000 additional projects are listed in a research institution file.

New: 75% *Updated:* 25%

Number of records in active working file: 600

Frequency of updating: Daily

Language of records: English

Data elements included: Project title, general project summary, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, subject descriptors or keywords, bibliographic references, geographical relevance

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title and text (available for use by others)

Source of subject indexing: Author/investigator

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy, machine-readable form (planned)

Processing and storage methods: Manual files and a computerized system operating on-line with an IBM 370/145 central processing unit; Delta 5500, Memorex 1377, and IBM 3277–2 video display terminals; ten IBM 3440 disk packs; and five magnetic tape units

System software: CDS/ISIS (available under certain conditions for use by others)—ISIS was originally developed by the International Labour Organization (ILO) and has been substantially modified by Unesco. CDS/ISIS is available through Unesco. The operating system is OS/VS1 with CICS. These software packages are used for ISORID, DARE, and the CARIS program in Paris.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service (planned), magnetic tapes (planned), on-line access at Unesco

AVAILABILITY:

Types of organizations served: In Member States, national government agencies, other national organizations, research institutions, and individual scholars; international organizations
Access limitations: Restricted to certain user groups
User fees: None
Descriptive material: Descriptive articles are included in the Unesco publications *Reports and Papers in the Social Sciences, No. 27, DARE: Unesco Computerized Data Retrieval System for Documentation in the Social and Human Sciences,* by Paul Vasarhelyi, Institute for Economic Planning, Budapest; and *No. 31, DARE Information Management System: A Condensed System Description (Computer Design Version 2).* Copies of these reports are available on request.

ADDITIONAL COMMENTS

The DARE system was designed to provide a computerized information management system for the Social Science Documentation Centre at the Unesco secretariat in Paris.

The system handles four interlinking files of about 4,000 records for information in the field of social sciences research: institutions, specialists, projects, and periodicals. The ongoing research information in the project file is expected to include 3,000 records; at present, there are approximately 600 records on file.

SSDC issues a number of publications concerning the documents and other institutional and biographical data in the file. Conference reports and working papers in the field are also produced.

1.22 WHO INFORMATION SERVICES (ISS)

World Health Organization
Avenue Appia
1211 Geneva 27
Switzerland

Telephone: 34 60 61
Telex: 27821
Cable address: UNISANTE GENEVA

System status: Developmental stage, initiated in 1977
Person responsible: DR S H MANDIL, Director, Information Systems Programme
Institutional affiliation:
World Health Organization (WHO)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International—WHO is, constitutionally, a decentralized organization with six regional offices having full authority and responsibility in servicing the countries in these respective regions: Africa, the Americas, Eastern-Mediterranean, Europe, South-East Asia, and the Western Pacific. The offices are located in Brazzaville, Washington, D.C., Alexandria, Copenhagen, New Delhi, and Manila.

Subject coverage: Biology, medical sciences, demography, economics, education, psychology, and sociology research

Institutional coverage: National government agencies, other national organizations, international organizations, and several hundred collaborating centers in fifty countries throughout the world

Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Language of records: English

Data elements included: Project title, project objectives, project methodology or approach, principal investigator, performing organization name, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: No subject indexing is performed at present; however, a thesaurus is under development.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files with some storage and processing on a computerized system operating in batch mode with magnetic tape

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

Publications: WHO ongoing research information appears in the following publications:

The Pan American Health Organization (PAHO), the WHO regional office for the Americas, biannually produces a volume, *Research in Progress.* The other regional offices are planning similar volumes for their respective regions.

At WHO headquarters, two research programs, the Special Programme of Research, Development and Research Training in Human Reproduction (HRP) and the Special Programme for Research and Training in Tropical Diseases (TDR), disseminate information about ongoing research in annual reports.

Other WHO programs which have research components publish lists of ongoing projects as necessary.

AVAILABILITY:

Types of organizations served: National government agencies, international organizations, and WHO collaborating centers throughout the world
Access limitations: Restricted to certain user groups
User fees: None

ADDITIONAL COMMENTS

WHO Information Services maintains profiles of all WHO research programs and projects. These profiles are used by ISS to respond to some queries and, largely, to refer specific queries to the responsible program or project manager.

Although ISS serves as the principal focal point within the organization for inquiries about current research, several WHO programs maintain information services within their respective research areas, and answer inquiries directly. Examples of these are:

1) The Research Promotion and Development (RPD) program's Register of Contractual Technical Service Agreements (RPD-2)—This is comprised of records for approximately 1,200 contractual technical service agreements, most of which are research agreements with WHO collaborating centers and institutions around the world, about 560 different institutions in all. In addition to the data elements shown above, general project summaries and performing organization addresses are collected.

2) The Special Programme of Research, Development and Research Training in Human Reproduction (HRP) Internal Management System (HRP-2)—Records for approximately 800 current projects are contained in a computerized system. General project summaries and performing organization addresses are also included on project records.

3) The Special Programme for Research and Training in Tropical Diseases (TDR) *Inventory of African Research Institutions* (TDR-1)—This publication, Reference No. TDR/WP/76.33, contains profiles for about 500 institutions engaged in research in the field. Profiles are primarily at the program rather than the project level, and are accompanied by an index arranged by country within geographic region. TDR is a new WHO program that is being cosponsored by the United Nations Development Programme, and is concerned with work on six diseases: malaria, schistosomiasis, filariasis, trypanosomiasis, leprosy, and leishmaniasis. An information system to record data about all research projects funded by the program is being developed.

4) The Clearing-House for On-Going Research in Cancer Epidemiology—Cosponsored by the World Health Organization, the International Agency for Research on Cancer (IARC), the German Cancer Research Centre *(Deutsches Krebsforschungszentrum, DKFZ)*, and the International Cancer Research Data Bank (ICRDB) program, the clearinghouse maintains records for approximately 1,000 research projects. The records are updated annually, and appear in the publication *Annual Directory of On-going Research in Cancer Epidemiology* (IARC Publication No. 17, 1977 edition, U.S. $10.00). Project records include general summaries, and are accompanied by indexes for subjects, anatomical sites, and other variables.

The WHO Information Services office activities in ongoing research information are being integrated into the larger bibliographic and statistical system operated by the organization. At present, technical literature of general interest is published in the WHO Technical Report Series. A list of series titles is available on request. ISS and individual program offices also disseminate documentation and reports based on completed research work.

1.23 WORLD MIND/WISE/REGISTER III RESEARCH INVENTORY INFORMATION SYSTEM

Faculty of Education
University of Calgary
Room 732, Education Tower
2920 24th Avenue N.W.
Calgary, Alberta T2N 1N4
Canada

Telephone: (403) 284–6296

System status: Developmental stage, initiated in 1970
Person responsible: DR. H. J. A. GOODMAN, Associate Professor
Institutional affiliations:
World Mind/WISE/REGISTER III

University of Calgary

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International
Subject coverage: Information sciences research—Subject coverage is interdisciplinary, concentrating on plans and problems concerning the organization of mankind's knowledge and its dissemination to individuals on a worldwide scale by a decentralized worldwide institution.
Institutional coverage: National government agencies, local government agencies, international organizations, individual researchers
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 0–120
New: 25% *Updated:* 75%
Number of records in active working file: 1,871
Frequency of updating: Irregular
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, project funding, subject descriptors or keywords, bibliographic references, degree or level of technology employed, historical summary, economic and political orientation, principal investigator's telephone number, project status

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Natural language (planned)
Source of subject indexing: No subject indexing is carried out at present.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form (audio tapes and cassettes)
Processing and storage methods: Manual files—A computerized system operating on-line with disk processing and storage capabilities is planned.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Personal requests only at present—On-line access via teleconferencing and full-text searching are planned.
Publications: A newsletter describing current activities is planned, as are state-of-the-art summaries and statistical analyses.

AVAILABILITY:

Types of organizations served: World Mind/WISE/REGISTER III members
Access limitations: Restricted to this user group
User fees: None

ADDITIONAL COMMENTS

At present World Mind/WISE/REGISTER III functions as an informal collegial network, some members of which are linked by computerized teleconferencing. The ongoing research project information system described above is maintained by Dr. Goodman himself.

1.24 WORLD SURVEY OF CURRENT RESEARCH AND DEVELOPMENT ON ROADS AND ROAD TRANSPORT

International Road Federation
1023 Washington Building
Washington, District of Columbia 20005
United States of America

Telephone: (202) 783-6722
Telex: 440336 INRFUI - Washington
Cable address: Introadfed - Washington

System status: Operational system initiated in 1964
Person responsible: MR A R RANKIN, Director of Research and Development
Institutional affiliations:
International Road Federation (IRF)

Federal Highway Administration (FHWA)

United States Department of Transportation (DOT) (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International
Subject coverage: Roads and road transport research
Institutional coverage: National government agencies, other national organizations, international organizations, research institutes, and private industry
Source of input: Performing organizations, supporting organizations—IRF receives input for the *World Survey* from three primary sources: direct contacts; the International Road Research Documentation (IRRD) program for most IRRD member countries; and the Transportation Research Board (TRB) for United States research activities.

FILE DESCRIPTION:

Number of records processed annually: 3,000–7,000
New: 60% *Updated:* 40%
Number of records in active working file: 5,430 (1976)
Frequency of updating: Every three years (however, new project information is published annually)
Language of records: English
Data elements included: Project title, project objectives, principal investigator, coinvestigators, performing organization name, performing organization address, contract, grant, or project number assigned, project status

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Codes for broad subject areas designated by the Transportation Research Board are included in HRIS or TRIS numbers assigned to each project record.
Source of subject indexing: TRB (IRF performs no subject indexing)

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: IRF provides no retrieval services from this data base of ongoing research information beyond publication of the directory listed below.
Publications: The 1976 edition of the *World Survey* is the eleventh in the series that has been prepared by IRF. The 1975 and 1976 editions included information on United States research projects in the field that was provided by the Transportation Research Board (TRB); TRB discontinued publication of

Highway Research in Progress to avoid duplicated efforts. The *World Survey of Current Research and Development on Roads and Road Transport* is prepared by IRF under contract to DOT in cooperation with TRB and the IRRD program of OECD. In addition to project information, a subject index according to TRB subject area codes is included.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations

User fees: None to affiliated organizations and contributing agencies; fees are charged for current and back issues of the *World Survey* that are distributed in hard copy or microfiche by the National Technical Information Service, U.S. Department of Commerce, to nonaffiliated organizations.

REGIONAL SERVICES

2.1 ASIAN MASS COMMUNICATION RESEARCH AND INFORMATION CENTRE (AMIC)

39 Newton Road
Singapore 11
Singapore

Telephone: 515106/7
Telex: FESSINO RS 21731 for AMIC
Cable address: AMICINFO, Singapore

System status: Operational system initiated in 1971
Person responsible: MISS CRISTINA Y. ESPEJO, Senior Programme Specialist (Documentation)
Institutional affiliations:
Friedrich-Ebert Foundation (principal funding organization)
Friedrich-Ebert-Stiftung (FES)

Government of Singapore

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional—Coverage coincides with the operational area of the Asia Broadcasting Union (ABU).
Subject coverage: Mass communications research
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations, universities, research institutes
Source of input: Performing organizations

FILE DESCRIPTION:

Language of records: English
Data elements included: Project title, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary (available for use by others)—The Unesco thesaurus *Mass Communication* by Jean Viet is used for subject indexing.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form
Processing and storage methods: Manual files, punched cards, and microform

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service
Publications: Ongoing research information is contained in the AMIC publication *Asian Mass Communication Institutions: Teaching, Training and Research – A Directory,* rev. ed. 1975, 130 pp., S $30.00. A *Supplement 1975* to this publication is also available for S $6.00 or U.S. $3.00.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, individual AMIC members
Access limitations: Restricted to certain user groups
User fees: Fees are charged for the publications listed above; no fees are charged for other retrieval services.
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

The general aim of AMIC is to promote the quality and performance of the media and other communications networks in the region within the broad framework of educational, economic, social, and cultural development. In fulfillment of these aims, AMIC organizes conferences, seminars, and workshops on mass communication and allied subjects; maintains a specialized library which serves as a documentation center for information in the field; collects and disseminates information about published literature, periodicals, audio-visual materials, and "fugitive" literature; provides consultative services; and produces publications such as conference proceedings and research monographs. Staff members also conduct basic research project themselves, and participate in international research endeavors.

2.2 BROWN'S GEOLOGICAL INFORMATION SERVICE LTD.

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160 North Gower Street
London NW1 2ND
United Kingdom

Telephone: 01-387 0610

System status: Operational system initiated in 1972
Person responsible: MR. G. H. BROWN, Director

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional (United Kingdom and Europe)

Subject coverage: Geology, petroleum geology, mining and minerals, land reclamation, environment, energy policy, resources policy, paleontology, petrology, mineralogy, tectonics/structure, and marine geology research—Coverage is incomplete for geomorphology, engineering geology, and oceanology, and no information is available on meteorology, space physics, astronomy, or geodesy.

Institutional coverage: National government agencies, other national organizations, foreign organizations

Source of input: Performing organizations—Input is also taken from other publications such as the *Results of Questionnaire on Post-Graduate Research Topics* produced annually by Professor M. R. House for the Committee of Heads of University Geology Departments, Hull; and the University of London *Geological Newsletter* (annual), Chelsea College, London.

FILE DESCRIPTION:

Number of records processed annually: 750

New: 90% *Updated:* 10%

Number of records in active working file: 2,000

Frequency of updating: Irregular

Language of records: English

Data elements included: Project title, project objectives, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, bibliographic references, performing organization telephone number, supervisor, degree sought if applicable

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available under certain conditions for use by others)—Subject indexing is only by geographic location and/or stratigraphic age. Name indexes of investigators and supervisors are also maintained.

Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base

Publications: Information about ongoing research projects forms part of the *Brown's Geological Information Bulletin* that is issued by the service monthly. The bulletin also contains bibliographic references to recent publications, abstracts of theses, news of latest explorations, conference reports, and a calendar of events of interest to the geologic community.

AVAILABILITY:

Types of organizations served: Organizations contributing input to the bulletin such as university geology departments in the United Kingdom and Ireland, plus some European ones, and research institutions (free of charge)—Commercial firms also receive copies of the bulletin on a fee basis.
User fees: Yes
Descriptive material: Brochures in English are available on request.

ADDITIONAL COMMENTS

Collection of information about ongoing research projects is part of the overall activities of Brown's Geological Information Service. In addition to monthly publication of the bulletin described above, service subscribers may receive consulting assistance in data collection and processing, preparation of bibliographies and abstracts, editorial and typing services, copying and library loan facilities, book and map ordering, and translation services.

2.3 CENTRAL ARCHIVE FOR EMPIRICAL SOCIAL RESEARCH *ZENTRALARCHIV FUER EMPIRISCHE SOZIALFORSCHUNG (ZA)*

Universitaet zu Koeln
Bachemer Strasse 40
5000 Cologne 41
Federal Republic of Germany

Telephone: 44 40 86

System status: Operatonal system initiated in 1960
Person responsible: PROF. DR. ERWIN K. SCHEUCH, Direktor
Institutional affiliations:

Economic and Social Sciences Department
Wirtschafts- und Sozialwissenschaftlichen Fakultaet

Cologne University
Universitaet zu Koeln

Working Group for Social Sciences Research Documentation
Arbeitskreis fuer die Dokumentation sozialwissenschaftlicher Forschung (ADSF)

Federal Ministry for Research and Technology (principal funding organization)
Bundesministerium fuer Forschung und Technologie (BMFT)

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DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional (Federal Republic of Germany, Austria, and German-speaking sections of Switzerland)

Subject coverage: Empirical social sciences research

Institutional coverage: National government agencies, other national organizations, universities, private research institutes, individual researchers

Source of input: ZA receives its ongoing research information from the Social Sciences Information Centre *(Informationszentrum Socialwissenschaften)* in Bonn.

FILE DESCRIPTION:

Number of records processed annually: 2,000

Number of records in active working file: 11,000

Frequency of updating: Annual

Language of records: German

Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, subject descriptors or keywords, bibliographic references, performing organization telephone number, project status, geographic area, data sources, data availability (machine-readable or other)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed nonhierarchical vocabulary (available for use by others)

Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files and a computerized system operating in batch mode with magnetic tape processing and storage capabilities

System software: SPSS

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base, magnetic tapes

Publications: ZA compiles information about empirical social research extracted from the IZ survey annually into *Empirische Sozialforschung: Eine Dokumentation.* The latest edition for 1975 (Munich: Verlag Dokumentation Muenchen, 1976) includes, in addition to project descriptions,

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comments and statistical analyses of survey results; indexes for investigators and subjects; lists of participating institutions and investigators by location; and appendixes containing copies of the original questionnaire and its summary.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, individual researchers
User fees: Yes
Descriptive material: Descriptive material in German is available on request.

ADDITIONAL COMMENTS

The Zentralarchiv fuer empirische Sozialforschung processes ongoing research information as part of its services of providing data sources and data analyses in the field of empirical social sciences research, especially survey research. The archive contains hard data resulting from research conducted throughout German-speaking areas of Europe, such as punched cards, magnetic tapes, and other results. These materials are stored in an automated storage and retrieval system for future use.

ZA also provides analyses of these data, consulting services for researchers planning new work, a library of bibliographic materials in the field, and background information on economic and public opinion surveys for the media.

2.4 COMPENDIUM OF CURRENT ENVIRONMENTAL STUDIES IN PUGET SOUND AND NORTHWEST ESTUARINE WATERS

Oceanographic Institute of Washington
312 First Avenue North
Seattle, Washington 98109
United States of America

Telephone: (206) 464-6272

System status: Operational system initiated in 1974
Persons responsible: MR JOSEPH PIZZO, Project Manager
MS CAM MCINTOSH, Editor
Institutional affiliations:
Oceanographic Institute of Washington (OIW)

Oceanographic Commission of Washington (OCW) (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional (marine and estuarine waters of the U.S. State of Washington and the Canadian Province of British Columbia)
Subject coverage: Marine sciences research
Institutional coverage: National government agencies, foreign organizations, state and local government agencies, academic institutions, private industry
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 433 (1976)
New: 46% *Updated:* 54%
Number of records in active working file: 433 (1976)
Frequency of updating: Quarterly
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, project funding, subject descriptors or keywords, bibliographic references, field observation period, geographic location, laboratory or field research, data availability

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed nonhierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: OIW compiles and publishes annually the *Compendium of Current Environmental Studies in Puget Sound and Northwest Estuarine Waters.* The latest edition, which covers 1976, contains descriptions for 433 projects arranged in 13 major research categories, plus indexes for investigator names, subjects, geographical areas, supporting organizations, and performing organizations. It contains more than 500 pages and is U.S. $16.00/copy.

OIW also publishes a bimonthly newsletter, *Northwest Currents,* that lists marine research projects in progress in Washington and British Columbia. It is distributed free of charge.

AVAILABILITY:

Types of organizations served: National government agencies, foreign organizations, state and local government agencies, academic institutions, private industry
User fees: Yes
Descriptive material: A descriptive brochure in English is available on request.

2.5 DOCUMENTATION CENTRE OF THE FEDERAL INSTITUTE FOR ROAD TRANSPORT *DOKUMENTATION DER BUNDESANSTALT FUER STRASSENWESEN (DOK BASt)*

Bundesanstalt fuer Strassenwesen
Bruehler Strasse 1
Postfach 51 05 30
5000 Cologne 51
Federal Republic of Germany

Telephone: 37021
Telex: 08882189 bas d

System status: Operational system initiated in 1965
Person responsible: MR. DIETER KOENIG, Regierungsdirektor
Institutional affiliations:

Federal Institute for Road Transport
Bundesanstalt fuer Strassenwesen (BASt)

Federal Ministry for Traffic
Bundesministerium foer Verkehr (BMV)

International Road Research Documentation (IRRD)
Internationale Dokumentation Strasse (IDS)

Organisation for Economic Co-operation and Development (OECD)
Organisation fuer wirtschaftliche Zusammenarbeit und Entwicklung

International Co-operation in the Field of Transport Economics (ICTED)
Internationale Zusammenarbeit zur Dokumentation ueber Verkehrswirtschaft (IZDV)

European Conference of Ministers of Transport (ECMT)
Europaeische Konferenz der Verkehrsminister

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional
Subject coverage: Roads, road transport, and transport economics research, bridge construction and civil engineering research
Institutional coverage: National government agencies, other national organizations, international organizations

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Source of input: Performing organizations—As part of the IRRD and ICTED programs, DOK BASt collects appropriate project information in roads and road transport and transport economics in the Federal Republic of Germany and forwards it to IRRD and ICTED for inclusion in these files. It also serves as the German Co-ordinating Centre for IRRD, processing information collected by other German-language national centers for input to the IRRD files. In return, DOK BASt receives copies of the IRRD and ICTED data bases on magnetic tape for incorporation into the DOK BASt file for use nationally.

FILE DESCRIPTION:

Number of records processed annually: 400 (German language projects only)
New: 75% *Updated:* 25%
Number of records in active working file: 1,600
Frequency of updating: Triannual
Language of records: German, English, French
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, record status, record source, updating status

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary—Terms are selected from the IRRD trilingual thesaurus (English, French, or German) for roads and road transport information; no subject indexing is performed for transport economics information to be sent to ICTED.
Source of subject indexing: Author/investigator, indexing staff with scientific background, outside experts

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form
Processing and storage methods: Manual files and a computerized system operating on-line with a Siemens 7.750 central processing unit, and magnetic tape and disk processing and storage capabilities
System software: FIDAS, GOLEM (Grossspeicherorientierte, listenorganisierte Ermittlungsmethode) (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, on-line access, searches of the historical file

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, universities, research institutes
User fees: None
Descriptive material: Descriptive material in English, French, and German is available on request.

ADDITIONAL COMMENTS

The DOK BASt file is composed of three files: a documentation center for research projects in the field of traffic which are promoted by the Federal Minister of Transport containing about 450 project records; a documentation center for research projects in the field of bridge construction and civil engineering (INGBAU) containing about 850 project records; and a documentation center for research contracts in the field of accident research sponsored by the Federal Institute for Road Transport containing about 300 project records.

In addition to ongoing research information, DOK BASt also has access to information on bibliographic materials in the fields from the IRRD and ICTED systems, and collects bibliographic information for the IRRD file.

2.6 EUROPEAN DOCUMENTATION AND INFORMATION SYSTEM FOR EDUCATION (EUDISED)
SYSTEME EUROPEEN DE DOCUMENTATION ET D'INFORMATION PEDAGOGIQUES

Documentation Centre for Education in Europe
Council of Europe
67006 Strasbourg Cedex
France

Telephone: (88) 61–49–61
Telex: Strasbourg 870 943
Cable address: EUROPA Strasbourg

System status: Developmental stage, initiated in 1969
Person responsible: MR. BERNHARD VON MUTIUS, Head
Institutional affiliations:

Documentation Centre for Education in Europe
Centre de documentation pour l'education en Europe

Council of Europe
Conseil de l'Europe

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional—Council of Europe Member States (Austria, Belgium, Denmark, the Federal Republic of Germany, Finland, France, Ireland, Italy, the Netherlands, Norway, Spain, Sweden, Switzerland, Turkey, the United Kingdom)—Eventually all 22 state signatories to the European Cultural Convention will be included.
Subject coverage: Education research

Institutional coverage: National government agencies, other national organizations
Source of input: National agencies in participating countries

FILE DESCRIPTION:

Number of records processed annually: 1,000
Number of records in active working file: 1,000
Frequency of updating: Once, when project is completed
Language of records: English, French, German, Dutch, Spanish
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, subject descriptors or keywords, bibliographic references, project supervisor

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)—Descriptors are taken from the EUDISED multilingual thesaurus (Dutch, English, French, German, Spanish). The thesaurus contains approximately 2,600 descriptors arranged in 19 main fields. A Portuguese version has been published by the Brazilian Ministry of Education.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy, machine-readable form (planned)
Processing and storage methods: Computerized system (INSPEC/PPL, London) operating in batch mode with magnetic tape processing and storage capabilities
System software: Under study

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Magnetic tapes—Other retrieval services to be offered are in the planning stage.
Publications: After an experimental issue in 1975, the *EUDISED R&D bulletin* was established on a regular basis. Currently four to six issues are published each year, each issue containing about 250 descriptions of ongoing and recently completed education research projects and pilot studies.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
Access limitations: Magnetic tapes are available to organizations cooperating in the EUDISED program.
User fees: None at present

ADDITIONAL COMMENTS

The Council of Europe's EUDISED project has as its aim the establishment of a computer-based European network of national agencies dealing with the main fields of education information. The network is attempting to create a common European market of educational ideas and experience for the improvement of education and for the benefit of decisionmakers and administrators, researchers and teachers, parents and students.

In addition to information about ongoing and completed research projects and pilot studies, EUDISED has collected information and published experimental bulletins on educational audio-visual materials and on educational periodicals. The educational policy of the 22 European Cultural Convention member states is covered in the bimonthly *News-letter/Faits nouveaux,* which is indexed with EUDISED descriptors.

2.7 EUROPEAN RESEARCH INFORMATION SERVICE ON MODERN LANGUAGES

Centre for Information on Language Teaching
and Research
20 Carlton House Terrace
London SW1Y 5AP
United Kingdom

Telephone: 01–839 2626/9

System status: Operational system initiated in 1966 for Great Britain, and in 1975 for Europe
Person responsible: MISS HELEN N. LUNT, Senior Research Information Officer
Institutional affiliations:

Centre for Information on Language Teaching and Research (CILT)

Department of Education and Science (DES)

Council of Europe
Conseil de l'Europe

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional—European participants of the European Cultural Convention may participate. At present, national data collection and dissemination centers have been designated in Cyprus, Denmark, Finland, France, the Federal Republic of Germany, the Republic of Ireland, the Netherlands, Switzerland, Turkey, and the United Kingdom.
Subject coverage: Language, linguistics, and language teaching research
Institutional coverage: Universities, colleges, and research institutes
Source of input: Individual scientists

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FILE DESCRIPTION:

Number of records processed annually: 500
New: 40% *Updated:* 60%
Number of records in active working file: 1,000
Frequency of updating: Every two to three years
Language of records: English, French
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date, supporting organization name, bibliographic references, address of principal investigator, coinvestigator affiliations, other cooperating organizations, form and language of results, number of other associates, degree if any, additional comments

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Alphabetical (natural language) indexing plus some standardization of terminology with necessary cross-referencing—Use of a fixed hierarchical vocabulary is planned.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, dissemination of the entire data base on loose-leaf sheets to national centers participating in the system

Publications: Prior to development of the European Research Information Service on Modern Languages, CILT collected and disseminated information on research in language and language teaching in Britain. The following publications contain that information:

Language and Language Teaching: Current Research in Britain 1972–75 (London: Longman Group Limited, 2nd edn 1976, 272 pages, ISBN 0 582 55536 1, £6.25 net)—This book is expected to be updated every two to three years. The current edition includes descriptions of 763 research projects, of which 423 were new since the previous edition, and the balance were for updated work. Indexes for names, institutions, and subjects, as well as appendixes, accompany the project descriptions. One appendix covers brief statements on 299 projects listed in the first edition that are no longer in progress; another provides a list of other information sources which might help users to trace research in related areas; and

Language Teaching and Linguistics: Abstracts, Current Research supplement (London: Cambridge University Press, quarterly, £10.-/year, £6.50 for individuals, single issues £3.-).

A research report published by CILT contains European research project information: *Survey of Research and Materials Development in Vocational Uses of English, French and German 1974* (London: Centre for Information on Language Teaching and Research, 1975, ISBN 0 903466 07 4, £1.50).

AVAILABILITY:

Types of organizations served: Organizations and individuals—In participating countries, access is via national centers.

User fees: Fees are charged for the publications listed above; fees are not normally charged for other retrieval services.

Descriptive material: Descriptive material in English is available on request. Material in other languages may be available from the national centers.

ADDITIONAL COMMENTS

CILT also collects and holds for reference copies of progress reports resulting from some research projects, if the contents are not confidential.

2.8 INTERNATIONAL EXCHANGE OF INFORMATION ON CURRENT CRIMINOLOGICAL RESEARCH PROJECTS IN MEMBER STATES
ECHANGE INTERNATIONAL D'INFORMATIONS SUR LES PROJETS DE RECHERCHES CRIMINOLOGIQUES DANS LES ETATS MEMBRES

Division of Crime Problems
Directorate of Legal Affairs
Council of Europe
67006 Strasbourg Cedex
France

Telephone: (88) 61-49-61
Telex: 870 943
Cable address: EUROPA Strasbourg

System status: Operational system initiated in 1966
Person responsible: MR. ERIK HARREMOES, Deputy Director of Legal Affairs
Institutional affiliations:

Division of Crime Problems
Division des problemes criminels

Directorate of Legal Affairs
Direction des affairs juridiques

European Committee on Crime Problems
Comite europeen pour les problemes criminels

Council of Europe
Conseil de l'Europe

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional—Council of Europe Member States (Austria, Belgium, Cyprus, Denmark, the Federal Republic of Germany, France, Greece, Iceland, Ireland, Italy, Luxembourg, Malta, the Netherlands, Norway, Portugal, Sweden, Switzerland, Turkey, the United Kingdom), plus Finland and Israel

Subject coverage: Criminology research

Institutional coverage: National government agencies, other national organizations, governmental and university institutes of criminology, independent research workers

Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 200

New: 80% *Updated:* 20%

Number of records in active working file: 1,050

Frequency of updating: Annual

Language of records: English and French

Data elements included: Project title, general project summary, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, subject descriptors or keywords, bibliographic references, project type (survey, replica, cross-cultural study, follow-up, action program, demonstration program, evaluation, or multi- or interdisciplinary research)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Project records are indexed by subject, by type of research, and by country. Subject terms are chosen from four fields: social phenomenon of criminality, offender, offences and other deviant behavior, and sanctions.

Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services are performed from this data base beyond issuance of the publication described below.

Publications: The *International Exchange of Information on Current Criminological Research Projects in Member States* is issued by the European Committee on Crime Problems of the Directorate of Legal

Affairs, Council of Europe, on an annual basis. The latest edition appeared in 1975, and contains descriptions of research projects arranged according to country name, plus indexes for subject areas, type of research, and countries. Some information about appropriate research projects in nonmember states is also included, as are updated descriptions of projects reported in earlier editions.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations, research institutes, individual researchers
User fees: None
Descriptive material: Bilingual descriptive material in English and French is available on request.

2.9 LATIN AMERICAN COUNCIL OF SCHOOLS OF ADMINISTRATION *CONSEJO LATINOAMERICANO DE ESCUELAS DE ADMINISTRACION (CLADEA)*

Facultad de Administracion
Universidad de los Andes
Calle 18 A, Carrera 1E
Apartado Aereo 4976
Bogota
Colombia

Telephone: 83 60 36
Cable address: UNIANDES

System status: Operational system initiated in 1967
Person responsible: DR. LUIS H. FAJARDO, Executive Director
Institutional affiliations:
School of Administration
Facultad de Administracion

University of the Andes
Universidad de los Andes (UNIANDES)

Thirty schools of business and public administration in Latin America

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional (Latin America)
Subject coverage: Administration research
Institutional coverage: Schools of business and public administration
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 15
Number of records in active working file: 20
Language of records: Spanish
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, project funding

SUBJECT INDEXING METHODS AND TECHNIQUES:

Source of subject indexing: No subject indexing of research project information is performed.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Responses to personal requests to the Executive Director

AVAILABILITY:

Types of organizations served: Schools of business and public administration
Access limitations: Restricted to certain user groups

ADDITIONAL COMMENTS

CLADEA is a nonprofit association of, at present, thirty schools of business and public administration and is headquartered at UNIANDES. Its aim is to contribute to the advancement and diffusion of the administrative sciences and techniques in Latin America. It operates in the fields of teaching, research, continuing education, technical assistance, documentation, and application of administrative disciplines to regional programs of social and economic development.

CLADEA operates four centers: the Teacher Development Center, the Research Division, the Center for Continuing Education, and the Documentation Center. In addition to monitoring its own research projects, the Documentation Center provides access to bibliographic materials and curriculum aids in the field, and also supports documentation centers at member schools.

2.10 NORDIC DOCUMENTATION CENTRE FOR LINGUISTICS *NORDISK DOKUMENTATIONSCENTRAL FOER SPRAAKVETENSKAP (SPRAAKDOK)*

Department of Computational Linguistics
University of Goteborg
Norra Allegatan 6
413 01 Goteborg
Sweden

Telephone: 031-11 13 60

System status: Pilot study initiated July 1977
Person responsible: DR. STURE ALLEN, Professor
Institutional affiliations:
Department of Computational Linguistics
Avdelningen foer spraaklig databehandling (SPRAAKDATA)

University of Goteborg
Goteborgs Universitet

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional (the Nordic countries)
Subject coverage: Linguistics research
Institutional coverage: University departments in the Nordic countries
Source of input: Individual scientists and research groups

FILE DESCRIPTION:

Data elements included: Project title, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary (available for use by others)
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system using a Data General Nova 840 central processing unit with 200M bytes of disk storage, magnetic tape storage, video display terminals, line printer, and other equipment with on-line processing and retrieval capabilities
System software: Custom software (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: SPRAAKDOK plans to publish an annual information report containing data about ongoing research projects in linguistics.

AVAILABILITY:

Types of organizations served: International organizations

2.11 PERMANENT INVENTORY OF AGRICULTURAL RESEARCH PROJECTS (AGREP)

AGREP Secretariat
Commission of the European Communities
DG XIII-B
Batiment Jean Monnet
Luxembourg-Kirchberg
Luxembourg

Telephone: 43011
Telex: 2752 EURDOC LU

System status: Operational system initiated in 1973
Person responsible: DR. G. ANDERLA, Director
Institutional affiliations:
Directorate-General for Agriculture, Division-Coordination of Agricultural Research (DG VI-E-4)

Directorate-General for Scientific and Technical Information and Information Management (DG XIII)

Commission of the European Communities (CEC)

European Communities (EC)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional (European Communities Member States—Belgium, Denmark, the Federal Republic of Germany, France, Ireland, Italy, Luxembourg, the Netherlands, and the United Kingdom)
Subject coverage: Agricultural sciences and related fields of research
Institutional coverage: National government agencies, other national organizations, international organizations
Source of input: National focal points of the Member States

FILE DESCRIPTION:

Number of records processed annually: 8,000
New: 43% *Updated:* 57%
Number of records in active working file: 15,000
Frequency of updating: Annual
Language of records: Dutch, Danish, English, French, German, Italian
Data elements included: Project title, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, project status, record updating status, indexer, publication availability, scientific staff man-months, codes for related project records, project duration

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Structured classification system consisting of numerical classification codes and English text
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form
Processing and storage methods: Computerized system operating on-line and in batch mode with magnetic tape and disk processing and storage capabilities—Data processing services are provided by I/S DATACENTRALEN, Retorvej, 6–8, 2500 Valby-Copenhagen, Denmark.
System software: Standard software packages for batch and on-line retrieval and custom software packages for data input and handling

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, magnetic tapes, statistical analyses of the data base
Publications: Ongoing research information is disseminated in printed form in listings, indexes, and other publications compiled on request.

AVAILABILITY:

Types of organizations served: National government agencies and other organizations in Member States
Access limitations: Restricted to these user groups
User fees: It has not yet been determined whether or not user fees will be charged.
Descriptive material: Descriptive material in Danish, Dutch, English, French, German, and Italian is available on request.

ADDITIONAL COMMENTS

Additional information on specific projects may be obtained either from the performing organizations or the national focal points in Member States.

2.12 PERMANENT INVENTORY OF ENVIRONMENTAL RESEARCH (ENREP)

ENREP Secretariat
Commission of the European Communities
DG XIII-B
Batiment Jean Monnet
Luxembourg-Kirchberg
Luxembourg

Telephone: 43011
Telex: 2752 EURDOC LU

System status: Developmental stage, initiated in 1976
Person responsible: DR. C. VERNIMB
Institutional affiliations:

Directorate-General for Scientific and Technical Information and Information Management (DG XIII)

Commission of the European Communities (CEC)

European Communities (EC)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional—European Communities Member States (Belgium, Denmark, the Federal Republic of Germany, France, Ireland, Italy, Luxembourg, the Netherlands, and the United Kingdom)
Subject coverage: Environmental sciences research
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations
Source of input: National focal points of the Member States

FILE DESCRIPTION:

Number of records processed annually: 8,000
New: 100% *Updated:* 0%
Number of records in active working file: 8,000
Language of records: Dutch, Danish, English, French, German, Italian
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, project funding, subject descriptors or keywords, document availability

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Machine-readable form—Data is provided by each Member State which assumes responsibility for its collection.
Processing and storage methods: Computerized system operating on-line with a Siemens central processing unit and disk storage and processing capabilities
System software: GOLEM

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: On-line access—Other retrieval services are being planned.
Publications: Publications containing ongoing research information are planned.

AVAILABILITY:

Types of organizations served: National government agencies and other organizations in Member States
Access limitations: Restricted to certain user groups
User fees: It has not yet been determined whether or not user fees will be charged.

ADDITIONAL COMMENTS

It is intended to integrate the ENREP system into a larger information system.

2.13 PROGRAM OF INFORMATION ON AFRICA
PROGRAMME D'INFORMATION SUR L'AFRIQUE

Centre d'etudes africaines
Ecole des hautes etudes en sciences sociales
54, boulevard Raspail
75006 Paris
France

Telephone: 544–39–74

System status: Operational system initiated in 1969
Person responsible: MRS. BRITTA RUPP

Institutional affiliations:
Centre of African Studies
Centre d'etudes africaines (CEA)

School of Advanced Studies in Social Sciences
Ecole des hautes etudes en sciences sociales (EHESS)

National Centre for Scientific Research
Centre national de la recherche scientifique (CNRS)

Association of Universities (operating) Partly or Entirely in French
Association des universites partiellement ou entierement de langue francaise (AUPELF)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional (the continent of Africa and its neighboring islands)
Subject coverage: Social sciences research in relation to Africa including genetics, population sciences, anthropology, demography, political science, sociology, linguistics, history, philosophy, religion, and the arts
Institutional coverage: National government agencies, foreign organizations, international organizations, universities, research institutions
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 1,000 (of these, approximately 600 pertain to doctoral theses)
New: 100% *Updated:* 0%
Number of records in active working file: 3,000
Frequency of updating: Every four years—Theses records, however, are updated annually.
Language of records: French
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, project funding, subject descriptors or keywords, bibliographic references, field research

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed vocabulary developed by Mrs. Rupp, *Vocabulaire des etudes africaines: ebauche d'une liste de descripteurs* (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services are provided beyond production of the publications described below.

Publications: EHESS now publishes the *Bulletin d'information et de liaison,* three subseries of which included ongoing research information: *Inventaire des theses et memoires africanistes de langue francaise soutenues; Inventaire de theses africanistes de langue francaise en cours;* and *Registre de recherches africanistes en cours.* The bulletin is being discontinued with the 1977 issues, however, and plans are underway to replace the sections pertaining to ongoing research with two other series.

As part of the Programme d'information sur l'Afrique, which is jointly sponsored by EHESS and AUPELF, a series of publications reviewing the state of research in specific subject areas will be produced. The areas planned at present are: Migration; oral traditions and traditional and modern literature; prehistory and precolonial and colonial history; political, economic, and legal development in Africa; knowledge, ideologies, and arts; natural environment and population; African languages; and social and political anthropology.

A second series will be *Inventaires de theses africanistes de langue francaise.* The series will be developed in conjunction with the Fichier central de theses, Universite de Paris-X, and will appear in two parts covering continuing and new work.

AVAILABILITY:

User fees: Yes
Descriptive material: Descriptive material in French is available on request.

ADDITIONAL COMMENTS

EHESS also deals with bibliographic information in the field of African studies in French. Sections of the *Bulletin d'information et de liaison* included a *Bibliographie francaise sur l'Afrique au sud du Sahara.* As part of the Programme d'information sur l'Afrique, a new series entitled *Bibliographie des publications en langue francaise sur l'Afrique au Sud du Sahara: sciences sociales et humaines* will be established.

EHESS is also concerned with documenting information resources in African studies in French, as well as the courses offered in the field.

2.14 RECORDS OF RESEARCH

Librarian
Joint EAAFRO/EAVRO Library
P.O. Box 30148
Nairobi
Kenya

Telephone: Kikuyu 2121–4 or 2106–7
Cable address: AGFORORG

System status: Operational system initiated in 1967
Person responsible: MR. RAMPURI, Librarian/Information Officer
Institutional affiliations:
East African Agriculture and Forestry Research Organization (EAAFRO)

East African Veterinary Research Organization (EAVRO)

East African Community (EAC) (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional (mainly Kenya, Tanzania, and Uganda)
Subject coverage: Agricultural sciences research including forestry and veterinary medicine
Institutional coverage: National government agencies, other national organizations, international organizations

FILE DESCRIPTION:

Language of records: English
Data elements included: Project title, progress reports, principal investigator, coinvestigators, performing organization name, research program of which project is a part, supporting organization name

SUBJECT INDEXING METHODS AND TECHNIQUES:

Source of subject indexing: No subject indexing of project information is performed.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service
Publications: Progress reports and results from research projects are included in:
Record of Research Annual Report 1973, East African Veterinary Research Organization, K. shs. 15/-;
Record of Research Annual Report 1973, East African Agriculture and Forestry Research Organization, K. shs. 15/-.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations
Access limitations: Restricted to certain user groups
User fees: Fees are charged for the publications listed above; no fees are charged for other retrieval services.
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

The East African Literature Service, which is also located within the Joint EAAFRO/EAVRO Library, collects and disseminates bibliographic information about completed research in the field, as well as publishing the *East African Agriculture and Forestry Journal* quarterly (U.S. $10.00/year).

2.15 REGISTER OF RESEARCH INTO HIGHER EDUCATION IN WESTERN EUROPE

Society for Research into Higher Education Ltd.
University of Surrey
Guildford, Surrey GU2 5XH
United Kingdom

Telephone: 0483 39003

System status: Operational system initiated in 1971
Person responsible: MR COLIN LESTER, Publications Officer
Institutional affiliations:
Society for Research into Higher Education Ltd. (SRHE)

University of Surrey

Council of Europe (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional (Western Europe, excluding the United Kingdom)
Subject coverage: Higher education research
Institutional coverage: Higher education institutes, educational technology and research institutes, schools and departments of education, national government agencies
Source of input: Author/investigator, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 100
New: 20% *Updated:* 80%
Number of records in active working file: 380
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Subject indexing is limited to assignment to one of ten broad subject areas (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services from this data base of ongoing research information are provided by SRHE beyond publication of the register described below.
Publications: The Society for Research into Higher Education is compiling the *Register of Research into Higher Education in Western Europe 1974–7* for publication in 1977. In addition to project descriptions arranged into ten broad subject areas, the register will include indexes for investigators and performing organizations. The price to society members is £3.60, to nonmembers £4.80 plus 25p postage.

AVAILABILITY:

Types of organizations served: Educational institutions, career offices, libraries
User fees: Yes
Descriptive material: A descriptive flier in English is available on request.

ADDITIONAL COMMENTS

The Society for Research into Higher Education also produces scholarly monographs, research reports, literature and research reviews, conference proceedings, and other pamphlets of interest in the field. A list of current publications is available on request.

The society formerly collected and disseminated information about research in higher education in the United Kingdom, but has discontinued this effort which is now undertaken by the National Foundation for Educational Research in England and Wales (NFER).

2.16 REGISTER OF RESEARCH PROJECTS SPONSORED BY EUROPEAN HOSPITAL CENTRES AND SIMILAR INSTITUTES

King's Fund Centre
126 Albert Street
London NW1 7NF
United Kingdom

Telephone: 01-267 6111

System status: Developmental stage, initiated in 1975
Person responsible: MR KEITH MORTON, Assistant Director
Institutional affiliations:
King's Fund Centre

King Edward's Hospital Fund for London

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional (coverage could be extended beyond Europe in time)
Subject coverage: Health services planning and management research
Institutional coverage: European hospital centers and similar institutes
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records in active working file: 40 in 1975 draft register
Frequency of updating: Biannual (planned)
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, performing organization name, performing organization address, project start date and end

start date and end date, supporting organization name, project funding, subject descriptors or keywords, bibliographic references, performing organization telephone number

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary will probably be developed (will be available for use by others)
Source of subject indexing: Author/investigator, editors

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: The King's Fund Centre does not at this time plan any retrieval services for this data base beyond publication of the register described below.
Publications: The planned *Register of Research Projects Sponsored by European Hospital Centres and Similar Institutes* is seen as a management tool for the involved institutes. In addition to the project information, a subject index for the register will be included.

AVAILABILITY:

Types of organizations served: National organizations other than government agencies—The register is intended primarily for contributors, but copies could be made available to interested organizations.
User fees: None
Descriptive material: A draft of the planned register in English is available.

ADDITIONAL COMMENTS

This system now has a small collection of summaries of research projects undertaken at various European hospital centers and similar institutes. Development into a comprehensive register depends on agreement, coordination, and cooperation of concerned and participating organizations.

Additional information about the projects described in the register would be available from the originating institutions.

2.17 REGISTRATION OF NORDIC PROJECTS RELATING TO DISABILITY

Handikappinstitutet
Ibsengatan 14 (Blackeberg)
Fack
161 25 Bromma 1
Sweden

Telephone: 08–87 01 70

System status: Operational system initiated in 1973
Person responsible: MR. KARL MONTAN, Director
Institutional affiliations:
Swedish Institute for the Handicapped
Handikappinstitutet

Nordic Committee on Disability
Nordiska namnden for handikappfraagor

Nordic Council of Ministers

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional, including the Nordic countries of Denmark, Finland, Norway, Sweden
Subject coverage: Engineering, electronics, materials technology, medical sciences, economics, education, psychology, and sociology research pertaining to the treatment and rehabilitation of the handicapped
Institutional coverage: Universities and research institutions
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 200
New: 50% *Updated:* 50%
Number of records in active working file: 213 (1977)
Frequency of updating: Annual
Language of records: English, Swedish, Danish, Norwegian
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, description date, contact person, coinvestigator affiliation

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical and nonhierarchical vocabularies—Project descriptions are classified according to 10 main categories that relate primarily to the handicap group concerned. Subject index terms are also selected, to some extent, from the ERIC thesaurus.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services for this data base are provided beyond publication of the register described below.
Publications: The Nordic Committee on Disability, in cooperation with the Swedish Institute for the Handicapped, publishes the annual survey entitled: *Registration of Nordic Projects Relating to Disability.* The latest edition covers 1976. In addition to project descriptions, the register includes subject and performing organization indexes. Future editions of the register will be produced by the committee which is located at the same address as the institute.

A list of reports issued within the projects, as well as a list of the funding agencies, can be obtained from the library of the Swedish Institute for the Handicapped.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations, and all other contributors to the register
User fees: None

2.18 SOCIAL SCIENCES INFORMATION CENTRE
INFORMATIONSZENTRUM SOCIALWISSENSCHAFTEN

Arbeitsgemeinschaft sozialwissenschaftlicher Institut e.v.
Lennestrasse 30
5300 Bonn
Federal Republic of Germany

Telephone: (0 22 21) 63 10 24

System status: Operational system initiated in 1973
Person responsible: DR. JOERG HAGENA, Managing Director
Institutional affiliations:
Association of Social Sciences Institutes
Arbeitsgemeinschaft sozialwissenschaftlicher Institut e. V. (ASI)

Regional Services

Federal Ministry for Research and Technology (principal funding organization)
Bundesministerium fuer Forschung und Technologie (BMFT)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional (Federal Republic of Germany, Austria, and German-speaking sections of Switzerland)
Subject coverage: Social sciences research
Institutional coverage: National government agencies, other national organizations, universities, private research institutes, individual researchers
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 5,000
New: 70% *Updated:* 30%
Number of records in active working file: 20,000
Frequency of updating: Annual
Language of records: German
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, subject descriptors or keywords, bibliographic references, performing organization telephone number, contact person name and telephone number, project type, project status, geographic area, data sources, data availability (machine-readable or other)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available under certain conditions for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy—Input is converted into machine-readable form using an optical reader.
Processing and storage methods: Computerized system operating on-line with a Siemens 4004/151 central processing unit, and magnetic tape and disk storage and processing capabilities
System software: Custom software and GOLEM II

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, magnetic tapes, microfiche
Publications: IZ conducts an annual survey of 4,000 social sciences research institutes and compiles the results into *Forschungsarbeiten in den Sozialwissenschaften* (Stuttgart: Kohlhammer Verlag). The latest edition for 1976 is 34,-DM. Copies are available from the publisher or directly from IZ.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, individual scientists and practitioners
User fees: Yes
Descriptive material: A descriptive brochure in German is available on request.

ADDITIONAL COMMENTS

IZ provides information about planned, ongoing, and completed research in the social sciences for organizations which are members of the Working Group for Social Sciences Research Documentation *(Arbeitskreis fuer die Dokumentation sozialwissenschaftlicher Forschung) (ADSF),* and for about twelve other organizations with interests in the social sciences.

2.19 SWEDISH COUNCIL FOR FORESTRY AND AGRICULTURAL RESEARCH
STATENS RAAD FOR SKOGS- OCH JORDBRUKSFORSKNING (SJFR)

Drottninggatan 95 B
P.O. Box 6806
113 86 Stockholm
Sweden

Telephone: 08–30 30 07

System status: Operational system initiated in 1967
Person responsible: DR. KAARE FROIER, Head Secretary

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Regional (Scandinavia) and national
Subject coverage: Agricultural sciences and forestry research
Institutional coverage: National government agencies, other national organizations
Source of input: Performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 300
New: 35% *Updated:* 65%
Number of records in active working file: 300
Frequency of updating: Annual
Language of records: Swedish
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, budget

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary (available under certain conditions for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and a computerized system operating in batch mode with magnetic tape processing and storage capabilities

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, on-line access
Publications: SJFR regularly produces the following publications containing ongoing research information:

The Forestry Section (Skogssektionen) produces a *Projektkatalog* twice yearly that includes information on the duration and budget of ongoing and completed research projects in the field. It also publishes a *Projektreferat* annually containing information and abstracts of final reports for projects completed during the year, and *Forsknings-promemoria* annually covering advance information on types and budgets for research to be completed.

The Agriculture Section (Jordbrukssektionen) publishes a *Projektreferat* annually for agricultural sciences research that is similar to the one on forestry described above. The section also produces a *Projektkatalog* annually that includes information on the description and status of projects in the field completed during the year and on those continuing into the next year.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations (Scandinavian research councils)
User fees: None
Descriptive material: Descriptive material in Swedish is available on request.

National and Subnational Services

AUSTRALIA

3.1 NATIONAL INFORMATION TRANSFER CENTRE (NITC)

National Library of Australia
Canberra A.C.T. 2600
Australia

Telephone: 621111
Telex: 62100
Cable address: Natlibaust Canberra

System status: Operational system initiated in 1974
Person responsible: MR. G. STIPNIEKS, Chief Librarian, Research Registration
Institutional affiliations:

Information System on Research in Documentation (ISORID)

United Nations Educational, Scientific and Cultural Organization (Unesco) (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Information science, documentation, and library science research
Institutional coverage: National govenment agencies, other national organizations
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 13
New: 100% *Updated:* 0%
Number of records in active working file: 51
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary, and the FID list of subject descriptors (available for use by others)
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy—The standard ISORID data sheet is used for input collection.
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: The National Information Transfer Centre publishes a list of recently reported research projects in the *ANSOL NEWS*, a *gratis* publication, approximately every six months.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, individuals
User fees: None

ADDITIONAL COMMENTS

As the National Information Transfer Centre for the ISORID program in Australia, the National Library of Australia collects and disseminates information about ongoing research projects, as well as progress and final research reports, in the fields of information and documentation. This input is incorporated into the ISORID data base at Unesco in Paris.

3.2 ROAD SAFETY INFORMATION SERVICE

Department of Transport
G.P.O. Box 1839Q
Melbourne, Victoria 3001
Australia

Telephone: (03) 620481
Telex: AA 30864
Cable address: TRANSPORT MELB

System status: Developmental stage, initiated in 1976
Person responsible: DR. I. R. JOHNSTON, Director
Institutional affiliations:
Department of Transport

Government of the Commonwealth of Australia (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Road safety research
Institutional coverage: Department of Tranport-sponsored research located at state organizations, universities, and with commercial consultants—Coverage of other road safety research in Australia may be added later.
Source of input: Supporting organization (Department of Transport)

FILE DESCRIPTION:

Number of records processed annually: 40
New: 25% *Updated:* 75%
Number of records in active working file: 20
Frequency of updating: Biannual
Language of records: English
Data elements included: The following data elements are planned for an input form currently under development: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)—The Road Safety Information Service employs the structured classification index developed by the Highway Safety Research Institute at the University of Michigan, Ann Arbor, Michigan, U.S.A.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file (planned)
Publications: The Road Safety Information Service plans to publish the information it collects about ongoing research projects in bulletins at six-month intervals (no charge). The first such summary is planned for completion in 1978. A list of titles and estimated completion dates for current research projects sponsored by the Department of Transport is available on request.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, state organizations
User fees: None
Descriptive material: In addition to the project list described above, a list of road safety research reports completed by the Department of Transport is available on request.

ADDITIONAL COMMENTS

The Road Safety Information Service will survey road safety research project and related information, collect and evaluate published scientific and technical reports in the field, regularly distribute reports and other information, and will respond to requests for information from within Australia and overseas.

A road safety research program at the Department of Transport has been in progress since 1970. An information retrieval system to handle requests for a library with more than 10,000 references is planned to be operational during 1977.

Via the Australian Road Research Board (ARRB), the Road Safety Information Service forwards project information for inclusion in the International Road Research Documentation (IRRD) system.

3.3 SCIENTIFIC AND TECHNICAL RESEARCH CENTRES IN AUSTRALIA (STRC)

Central Information Service
CSIRO
314 Albert Street
P.O. Box 89
East Melbourne, Victoria 3002
Australia

Telephone: (03) 419 1333
Telex: 30236
Cable address: CORESEARCH MELBOURNE

System status: Operational system initiated in 1975
Persons responsible: MR. C. GARROW, Manager
MR. IAN A. CRUMP, Editor
Institutional affiliations:
Central Information Service

Commonwealth Scientific and Industrial Research Organization (CSIRO)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, computer sciences, electronics, materials technology, earth and space sciences, astronomy and astrophysics, chemistry, biology, medical sciences, agricultural sciences, anthropology, demography, education (scientific), and psychology research
Institutional coverage: National government agencies, other national organizations, private industry, universities and colleges

Source of input: Performing organizations

FILE DESCRIPTION:

Frequency of updating: Biennial
Language of records: English
Data elements included: General project summary, progress reports, performing organization name, performing organization address, research program of which project is a part, subject descriptors or keywords, bibliographic references, performing organization telephone, telegraphic code, and telex numbers, research director, contact person, library facilities, staff

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)—The directory index includes broad subject headings and specific subject terms; cross references are supplied when appropriate.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode and on-line using a CDC 7600 central processing unit with disk and magnetic tape processing and storage capabilities
System software: General File Maintenance System (GFMS), developed by CSIRO Central Information Service—GFMS is used to maintain a number of bibliographic systems in CSIRO and other organizations in Australia.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, on-line access—Microfiche will be available in 1978.
Publications: The directory *Scientific and Technical Research Centres in Australia* was last compiled by CSIRO in 1975. It gives profiles of centers, and incidentally includes listings of brief descriptions of current research projects for each center. The 1975 edition includes data collected through 1974 for 1,150 centers. Profiles are accompanied by subject and organization name indexes. The directory, ISBN 0 642 00145 (hard cover, U.S. $7.50) or ISBN 0 643 00140 9 (paperback, $5.00) may be requested from CSIRO. Editions are to be produced biennially. The 1978 update will be produced in microfiche.

Information about ongoing research activities also appears in *CSIRO Research Objectives 1976.*

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, hospitals, nonprofit research institutes, advanced colleges
User fees: Yes
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

CSIRO operates a full-scale library and documentation information service. In addition to compilation of STRC, retrospective and current awareness search services of bibliographic files, information services related to numerical data bases, and referral and inquiry services are offered.

3.4 TRANSPORT PLANNING AND RESEARCH PROGRAM PROGRESS REPORT

Department of Transport
P.O. Box 367
Canberra City, A.C.T. 2601
Australia

Telephone: 490211
Telex: 62221

System status: Operational system initiated in 1976
Person responsible: MR. T. H. COOKE, Director, Land Transport Research and Technical Development
Institutional affiliations:
Department of Transport

Government of the Commonwealth of Australia (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Transport planning and research
Institutional coverage: National government agencies, state government organizations and institutions
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 350
New: 20% *Updated:* 80%
Number of records in active working file: 350
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name,

project end date, contract, grant, or project number assigned, project funding, bibliographic references, summary of reports and data published

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: None—At present, descriptive project titles, and unique designators (representing state, instrumentality, year of initiation, and serial) are used for indexing purposes. A standard vocabulary may be used in the future.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files with some assistance from a computerized sorting process

System software: Custom software for sorting

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services are provided beyond publication of the report described below.

Publications: The *Transport Planning and Research Program Progress Report* containing ongoing research information was first published in 1976, and annual editions are planned.

AVAILABILITY:

Types of organizations served: National government agencies, state organizations

User fees: None

ADDITIONAL COMMENTS

Access to completed reports mentioned in the progress summaries of the projects is also available through the Department of Transport.

AUSTRIA

4.1 ROAD RESEARCH DOCUMENTATION CENTRE
DOKUMENTATIONSSTELLE FUER STRASSENBAU UND VERKEHRSTECHNIK

Geotechnisches Institut
BVFA Arsenal
1030 Vienna
Austria

Telephone: (0222) 65 36 66/509
Telex: 07/6677
Cable address: Bundesversuch Wien

System status: Operational system initiated in 1975
Person responsible: DR. SEPP SNIZEK
Institutional affiliations:

Federal Research Institute Arsenal
Bundesversuchs- und Forschungsanstalt Arsenal (BVFA)

Federal Ministry for Construction and Technology
Bundesministerium fuer Bauten und Technik (BMfBuT)

International Road Research Documentation (IRRD)

Organisation for Economic Co-operation and Development (OECD) (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Roads and road transport research
Institutional coverage: National government agencies, other national organizations, international organizations, universities, private consultants
Source of input: Supporting organizations—The Road Research Documentation Centre collects input about ongoing roads research in Austria and contributes it to the International Road Research Documentation (IRRD) program. As an IRRD member, the center receives a copy of the entire IRRD data base of ongoing research information throughout the world for use in Austria.

FILE DESCRIPTION:

Number of records processed annually: 100 (Austria only)
New: 70% *Updated:* 30%
Number of records in active working file: 10,000 (international)
Frequency of updating: Every three years (however information about new projects is added to the data base annually)
Language of records: English, French, German

Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, record status, record source, updating status

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)—Terms are selected from the IRRD trilingual thesaurus (English, French, or German).
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode with a UNIVAC 494 central processing unit, and magnetic tape and disk processing and storage capabilities
System software: Modok IV (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service
Publications: The Road Research Documentation Centre includes ongoing research information in two regular publications:

Dokumentation ueber Forschungsvorhaben und wissenschaftliche Arbeiten in Oesterreich verfasst von der Dokumentationsstelle fuer Strassenbau und Verkehrstechnik, Schriftenreihe Strassenforschung des Bundeministeriums fuer Bauten und Technik (Vienna, latest edition 1976, free); and

Jahresbericht, Schriftenreihe Strassenforschung des Bundesministeriums fuer Bauten und Technik (Vienna, latest edition 1975, free).

Each publication is produced annually.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, universities, private consultants
User fees: In some cases
Descriptive material: The two publications in German listed above are available on request.

ADDITIONAL COMMENTS

As part of the IRRD system, the Road Research Documentation Centre also has access to the bibliographic abstracts in the IRRD file.

BELGIUM

5.1 SCIENCE POLICY PROGRAMMING SERVICES (SPPS)
SERVICES DE PROGRAMMATION DE LA POLITIQUE SCIENTIFIQUE (SPPS)
DIENSTEN VOOR PROGRAMMATIE VAN HET WETENSCHAPSBELEID (DPWB)

rue de la Science, 8
1040 Brussels
Belgium

Telephone: 02/511.59.85
Telex: PROSCIENT BRU B 24501

System status: Operational system initiated in 1970
Person responsible: MR. J. DEFAY, Chef du service des etudes et des statistiques
Institutional affiliation:
Office of the Prime Minister
Services du Premier Ministre
Diensten van de Eerste Minister

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National (including national regions and local identification)
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations in Belgium, higher educational institutions, research associations, private and public commercial enterprises—R & D information for private and public commercial enterprises is not available publicly.
Source of subject indexing: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 4,000–5,000
Number of records in active working file: 8,000–10,000
Frequency of updating: Biennial
Language of records: French, Dutch, and (in 1972) English
Data elements included: Project title, project objectives, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, supporting organization name, supporting organization address, project funding, subject descriptors or keywords, budget, staff, project type (basic, applied, experimental development), publication authorization, coinvestigator affiliations

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SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)
Source of subject indexing: Author/investigator (project disciplines), indexing staff with scientific background (project objectives)—At present, subject indexing is based only upon keywords from project titles. Abstracts or summaries of projects would be useful for improved indexing of objectives, as the titles are not always sufficiently explicit for this purpose. Current staff limitations do not permit subject indexing of abstracts or summaries; this might be accomplished in the future with assistance from document retrieval systems or networks.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy—Computer printouts for previous research project titles are submitted to unit heads for revision, addition of new project titles, or deletion of completed project information.
Processing and storage methods: Computerized system with disk storage and high-speed printer
System software: Custom-designed software (available for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service (available internally only), statistical analyses of the data base
Publications: SPPS annually publishes a *Science and Technology Yearbook (Annuaire science et techologie, Wetenschap en Technologie Jaarboek)* which contains some of the ongoing research data elements listed above. Information about private and public commercial firms is excluded from the yearbook.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations
Access limitations: No information about public and private commercial firms is available without prior authorization.
User fees: None

ADDITIONAL COMMENTS

The information about ongoing research projects collected by SPPS forms part of a more comprehensive survey of the scientific potential of the country. Detailed administrative and budgetary information is collected about research organizations; this data is used to create a file from which statistical analyses may be extracted.

BOLIVIA

6.1 NATIONAL SCIENTIFIC AND TECHNOLOGICAL DOCUMENTATION CENTER
CENTRO NACIONAL DE DOCUMENTACION CIENTIFICA Y TECNOLOGICA (CNDCT)

Casilla Correo 3283
La Paz
Bolivia

Telephone: 50555, 50333
Cable address: CASILLA CORREO 3283,
LA PAZ BOLIVIA

System status: Developmental stage, initiated in 1968
Person responsible: LIC. HUGO LOAIZA TERAN, Director
Institutional affiliation:
San Andres Major University
Universidad Mayor de San Andres (UMSA)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Physics, engineering, computer sciences, electronics, materials technology, earth and space sciences, chemistry, biology, medical sciences, agricultural sciences, economics, and psychology research
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 4
New: 30% *Updated:* 70%
Number of records in active working file: 16
Frequency of updating: Semiannual
Language of records: Spanish
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, performing organization name, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available for use by others)
Source of subject indexing: Indexing staff without scientific background

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DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service
Publications: The National Scientific and Technological Documentation Center produces a quarterly publication, *Actualidades,* available on an exchange basis, that contains ongoing research information.
User fees: Yes
Descriptive material: Descriptive material in Spanish is available on request.

ADDITIONAL COMMENTS

The National Scientific and Technological Documentation Center serves as the technical secretariat for the National System and Fund of Information for Development that is administered by the Ministry of Planning and Coordination. No information is available at this time from the system.

BRAZIL

7.1 BRAZILIAN CURRENT AGRICULTURAL RESEARCH INFORMATION SYSTEM (BRACARIS)
SISTEMA BRASILEIRO DE INFORMACAO SOBRE PESQUISA AGROPECUARIA EM ANDAMENTO

EMBRATER/SNIR
Projeto PNUD/FAO/BRA/72/020
Avenida W3 Norte, Quadra 515, Bloco C,
Lote 3
C.P. 04-0019
70.000 Brasilia DF
Brazil

Telephone: 273-31-00
Telex: 061-1337

System status: Operational system initiated in 1976
Person responsible: DR. JAIME ROBREDO, Project Manager and Placido Flaviano curvo Filho
Institutional affiliations:

National System of Agricultural Information and Documentation
Sistema Nacional de Informacao e Documentacao Agricola (SNIDA)

National Rural Information System
Sistema Nacional de Informacao Rural (SNIR)

Brazilian Agency for Rural Technical Assistance and Extension (principal funding organization)
Empresa Brasileira de Assistencia Tecnica e Extensao Rural (EMBRATER)

Ministry of Agriculture
Ministerio da Agricultura

Current Agricultural Research Information System (CARIS)
Systeme d'information sur la recherche agronomique en cours

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Agricultural sciences research
Institutional coverage: National government agencies, other national organizations
Source of input: Performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 5,360
Number of records in active working file: 5,360
Frequency of updating: Annual
Language of records: Portuguese, English
Data elements included: Project title, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date (planned), supporting organization name (planned), supporting organization address (planned), contract, grant, or project number assigned, project funding (planned), subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical and nonhierarchical vocabularies—CARIS and AGRIS terms and codes are used for indexing purposes. A Brazilian thesaurus of the terms has been developed.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files, punched cards
System software: BRACARIS custom software (available under certain conditions for use by others)—The software programs are expected to become operational in 1977–1978.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base, magnetic tapes, and on-line access are planned to be operational in 1977–1978.
Publications: BRACARIS is in the process of publishing a two-volume guide to Brazilian research activities in the field of agriculture, *Guia Brasileiro de Pesquisa Agricola em Andamento* (Brasilia: EMBRATER/SNIR, 1977, Doc/Tec/77/018 and 019). *Volume 1, Cadastro de Instituicoes* is now available and includes information about 300 research institutions, 2,398 research workers, and 5,360 ongoing research projects. Institution profiles are presented according to geographic regions, and are accompanied by indexes for institution and researcher names. *Volume 2, Programas/Projetos* is in press, and will include program and project information plus indexes for programs, projects, and institution codes. Annual updates of the guide are planned.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations
User fees: Yes (planned)
Descriptive material: Descriptive material is available.

ADDITIONAL COMMENTS

The BRACARIS system will be integrated with the BRAGRIS bibliographic system (the Brazilian version of AGRIS). Formatting, selective dissemination of information, and information retrieval software have been designed to process AGRIS magnetic tapes.

At present, information about ongoing research projects collected by BRACARIS is forwarded to a CARIS Coordinating Centre for incorporation into the CARIS international system. Further integration of the BRACARIS system into the CARIS system is planned.

Bibliographic information collected under the BRAGRIS system is integrated into the International Information System for Agricultural Sciences and Technology (AGRIS) file.

7.2 FOLLOW-UP SYSTEM FOR PROJECTS OF THE BASIC PLAN
SISTEMA DE ACOMPANHAMENTO DE PROJETOS DO PLANO BASICO (SELAP)

Coordenacao dos Programas do Plano Basico
Conselho Nacional de Desenvolvimento
Cientifico e Tecnologico
Praia do Flamengo, 200
20.000 Rio de Janeiro RJ
Brazil

Telephone: 2056332
Telex: CNPq 21288
Cable address: PESQUISA

System status: Developmental stage, initiated in 1976
Person responsible: DR. PETER RUDOLF SEIDL, Coordenador dos Programas do Plano Basico
Institutional affiliations:

Coordination for Programs of the Basic Plan
Coordenacao dos Programas do Plano Basico

National Council for Scientific and Technological Development
Conselho Nacional de Desenvolvimento Cientifico e Tecnologico (CNPq)

Planning Secretariat of the Presidency of the Republic
Secretaria de Planejamento da Presidencia da Republica (SEPLAN)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Technological development in physics, engineering, computer sciences, electronics, earth and space sciences, astronomy and astrophysics, chemistry, biology, medical sciences, agricultural sciences, economics, education, sociology, communication, and information sciences research
Institutional coverage: National government agencies, other national organizations
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 500
New: 20% *Updated:* 80%
Number of records in active working file: 400
Frequency of updating: Annual
Language of records: The language of the records is currently being redefined.
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords, performing organization telephone number, performing organization affiliation, budget, project status, significant events in the history of the project, name and type of participating national organizations, name and type of participating foreign or international organizations, person to contact

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text—Index points are assigned according to categories of the Basic Plan.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode using an IBM 370/135 central processing unit, with 1600 bpi 9-track magnetic tape processing and storage capabilities—Future plans include on-line retrieval capabilities and the use of a PDP 11 central processing unit.
System software: Custom software packages

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base, magnetic tapes
Publications: SELAP produces inventories of ongoing research project information for internal use only.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations
Access limitations: Restricted to certain user groups
User fees: None

7.3 RESEARCH IN PROGRESS AT THE FEDERAL UNIVERSITY OF MINAS GERAIS
PESQUISAS EM ANDAMENTO NA UNIVERSIDADE FEDERAL DE MINAS GERAIS

Conselho de Pesquisas
Universidade Federal de Minas Gerais
Caixa Postal 1621
30.000 Belo Horizonte
Minas Gerais
Brazil

Telephone: 441–0066

System status: Operational system established in 1927
Person responsible: DR. EDUARDO OSORIO CISALPINO, Reitor
Institutional affiliations:

Research Council
Conselho de Pesquisas

Federal University of Minas Gerais
Universidade Federal de Minas Gerais (UFMG)

Ministry of Education and Culture
Ministerio de Educacao e Cultura (MEC)

Government of Brazil
Governo Brasileiro

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Local (Federal University of Minas Gerais only)
Subject coverage: All fields of scientific research
Institutional coverage: Federal University of Minas Gerais
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 800
New: 35% *Updated:* 65%
Number of records in active working file: 400
Frequency of updating: Annual
Language of records: Portuguese
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end

date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Broad subject fields are indexed, as are departments and investigators.
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base
Publications: UFMG includes ongoing research information in these regular publications:

Relatorio das Atividades de 1976: Atividades de Pesquisa (produced annually and distributed free);

Pesquisas em Andamento na UFMG 1974—Project descriptions are arranged according to the administrative organization of the university, and are accompanied by investigator and subject indexes, in this report.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
User fees: None
Descriptive material: Descriptive material in Portuguese is available on request.

ADDITIONAL COMMENTS

The Coordenacao da Biblioteca Universitaria at UFMG has also compiled a list of recent publications by staff members, *Boletim Bibliografico 1964–1972.*

More information about specific projects is available by contacting the university departments directly.

BULGARIA

8.1 AUTOMATED INFORMATION SYSTEM FOR FUNDAMENTAL AND APPLIED RESEARCH AND DESIGN TASKS AS WELL AS DISSERTATIONS

AVTOMATIZIRANA INFORMATSIONNA SISTEMA ZA REGISTRATSIYA NA NAUCHNO IZSLEDOVATELELSKITE RAZRABOTKI I ZASHCHITENI DISERTATSII (SIRENA)

Central Institute for Scientific and
Technical Information
52A, G. A. Nasser Street
P.O. Box 71
1197 Sofia
Bulgaria

Telephone: 71 91 91
Telex: 022404 ZINTI BG

System status: Operational system initiated in 1976
Person responsible: DR. S. V. SIMEONOV, Director
Institutional affiliations:
Central Institute for Scientific and Technical Information (CISTI)
Tsentralen institut za nauchna i tekhnitseska informatsiya (ISINII)

Committee for Science, Technical Progress and Higher Education (principal funding organization)
Komitet za nauka tekhnicheski progres i visshe obrazovanie (KNTPVO)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, other national organizations
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 5,000
New: 50% *Updated:* 50%
Number of records in active working file: 5,000
Frequency of updating: Every three months
Language of records: Bulgarian
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed nonhierarchical vocabulary
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode with an IBM 370/135 central processing unit and magnetic tape and disk processing and storage capabilities, and IBM 3277 and 3275 on-line terminals
System software: Standard IBM software packages CICS/VS, STAIRS/VS, and VIDEO/370

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base, on-line access

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations, universities
Access limitations: Restricted to certain user groups
User fees: None
Descriptive material: Descriptive material in Bulgarian and Russian is available on request.

CANADA

9.1 ANNUAL REPORT OF THE NATIONAL INSTITUTE FOR SCIENTIFIC RESEARCH
RAPPORT ANNUEL DE L'INSTITUT NATIONAL DE LA RECHERCHE SCIENTIFIQUE

Institut national de la recherche scientifique
Universite du Quebec
Complexe scientifique
2700, rue Einstein
C.P. 7500
Sainte-Foy, Quebec G1V 4C7
Canada

Telephone: (418) 657–2508
Telex: 011–3324

System status: Operational system initiated in 1971
Person responsible: DR. GUY REEVES, Secretary-General
Institutional affiliations:
National Institute for Scientific Research
Institut national de la recherche scientifique (INRS)

University of Quebec
Universite du Quebec

Quebec Ministry of Education (principal funding organization)
Ministere de l'Education du Quebec (MEQ)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Local (INRS research centers only, all located in the Province of Quebec)
Subject coverage: Physics, engineering, electronics, materials technology, earth and space sciences, chemistry, medical sciences, education, and urbanization research
Institutional coverage: The eight INRS research centers
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 280
New: 40% *Updated:* 60%
Number of records in active working file: 280
Frequency of updating: Annual
Language of records: French
Data elements included: Project title, project objectives, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date (in some cases), supporting organization name, contract, grant, or

project number assigned, project funding, subject descriptors or keywords, bibliographic references, project duration, budget

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text
Source of subject indexing: Author/investigator

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base, magnetic tapes

Publications: INRS produces an annual report that includes descriptions of ongoing research projects arranged by research center, and then according to research program. The report also contains indexes for staff members, students, associates, a bibliography of recent staff publications, and financial statements. The 1975–1976 edition is the latest available, and is free of charge.

The eight individual INRS research centers also produce annual reports that contain information about their current projects.

In addition to the scientific project information that appears in the annual reports, INRS maintains an in-house Automated Management Budgeting System that issues monthly financial reports for the projects and programs it performs. This financial management system is computerized, and statistical analyses are made from data base contents. Access to this information is limited to INRS staff.

AVAILABILITY:

Types of organizations served: National government agencies, provincial government agencies, universities, and other interested organizations

Access limitations: The annual reports described above are publicly available; other retrieval services are restricted to certain user groups.

User fees: Yes

Descriptive material: Descriptive materials in French are available on request.

ADDITIONAL COMMENTS

INRS is a research and teaching institution whose main functions are to conduct basic research, provide advanced training for students, and coordinate its own and other public and private activities in the fields of water, education, energy, oceanography, petroleum, health, telecommunications, and urbanization research in the Province of Quebec.

9.2 CANADIAN COMMUNICATIONS RESEARCH INFORMATION CENTRE (CCRIC)
CENTRE CANADIEN D'INFORMATION SUR LA RECHERCHE EN COMMUNICATIONS (CCIRC)

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255 Albert Street
P.O. Box 1047
Ottawa, Ontario K1P 5V8
Canada

Telephone: (613) 237–3400, extension 411 or 493
Telex: 053–3500 CANCONARTS OTT

System status: Developmental stage, initiated in 1974
Person responsible: MR. ASH K. PRAKASH, Executive Director
Institutional affiliations:

Canadian Commission for Unesco (funding organization)
Commission canadienne pour l'Unesco

Canada Arts Council (funding organization)
Conseil des arts du Canada

Canadian Broadcasting Corporation (CBC) (funding organization)
Societe Radio-Canada

Canadian Radio-television and Telecommunications Commission (CRTC) (funding organization)
Conseil de la radiodiffusion et des telecommunications canadiennes

Federal Department of Communications (funding organization)
Ministere federal des communications

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mass communications research
Institutional coverage: National government agencies, other national organizations, universities
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 125
New: 20% *Updated:* 80%
Number of records in active working file: 75
Frequency of updating: Annual
Language of records: English and French

Data elements included: Project title, general project summary, principal investigator, coinvestigators, performing organization name, project start date and end date, supporting organization name, subject descriptors or keywords, respondent's name, respondent's telephone number

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary (available for use by others)—A modified version of Jean Viet's trilingual thesaurus, *Mass Communication*, is employed for subject indexing.
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files—A computerized system is planned.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: CCRIC compiles annually *A Register of Communications Research in Canada* in a bilingual English/French format. The register contains descriptions of appropriate research projects arranged according to the principal investigator's last name, plus indexes for investigators, performing organizations, supporting organizations, provinces, and subjects. The latest edition for 1975–1976 is Canadian $3.00; a status report for information in the 1974–1975 edition is free of charge; and the 1974–1975 edition is $5.00.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, universities
User fees: Fees are charged for some of the publications described above; no fees are charged for other retrieval services.
Descriptive material: Descriptive brochures in English and French are available on request.

ADDITIONAL COMMENTS

The Canadian Communications Research Information Centre was founded in 1974 to create a national clearinghouse for the collection of information about communications policy, research, resources, activities, and innovations in Canada; to provide access to existing information resources and to facilitate communication within the research community; to disseminate information through publications and other channels; to exchange information in the field with similar centers outside Canada; and to respond to requests for information or assistance upon demand concerning Canadian communications research.

In addition to collecting and disseminating ongoing research information, to fulfill these objectives the center offers referral service to inquiries; maintains files on researchers and research organizations in the field; keeps abreast of educational activities in mass media and educational technology; and has established a small reference library.

CCRIC also publishes a bilingual bimonthly newsletter that contains information about activities, research results, and other bibliographic information in mass media research.

9.3 CANADIAN PLAINS RESEARCH CENTER INFORMATION SYSTEM

Canadian Plains Research Center
University of Regina
Regina, Saskatchewan S4S 0A2
Canada

Telephone: (306) 584–4758
Telex: 071–2683

System status: Developmental stage, initiated in 1973
Persons responsible: DR. M. EVELYN JONESCU, Director
MS. D. CHRISTENSEN, Coordinator of Information Services
Institutional affiliation:
Canadian Plains Research Center (CANPLAINS)

University of Regina (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Subnational (Northern Great Plains area of the Canadian Provinces of Manitoba, Saskatchewan, and Alberta)
Subject coverage: Engineering, materials technology, earth and space sciences, biology, medical sciences, agricultural sciences, anthropology, demography, economics, education, political science, psychology, sociology, history, and fine arts research related to the Northern Great Plains region
Institutional coverage: National government agencies, provincial government agencies, universities and colleges, research councils, private organizations
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 1,350
New: 80% *Updated:* 20%
Number of records in active working file: 2,700
Frequency of updating: Annual (planned)
Language of records: English
Data elements included: Project title, principal investigator, coinvestigators, performing organization name, performing organization address, project end date, supporting organization name, contract, grant, or project number assigned, subject descriptors or keywords, project type with respect to organizational affiliation, principal investigator's address if different from that for the performing organization, coinvestigators' addresses if different from that for the performing organization,

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geographic location, project status (in some cases), past areas of study for principal investigator, titles of completed research projects, areas of potential study for principal investigator

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary (available under certain conditions for use by others)
Source of subject indexing: Author/investigator, indexing staff with scientific background, outside staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating on-line and in batch mode with a Xerox Sigma 9 central processing unit and disk processing and storage capabilities
System software: Versatile Information Processing (VIP) plus custom software programs—VIP is available under certain conditions for use by others from COMSHARE, 2 Idell Lane, Brampton, Ontario, Canada.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: CANPLAINS is planning to produce printed directories of researchers and research projects in the region. Ongoing research information has been compiled by CANPLAINS into:
University of Regina Research Directory 1975 (1975, no charge); and the
University of Regina Research Directory 1974 (1974, no charge).

AVAILABILITY:

Types of organizations served: National government agencies, provincial government agencies, universities and colleges, private organizations
User fees: Yes
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

The Canadian Plains Research Center was established to encourage and facilitate research pertinent to the Northern American Plains region. In addition to this data base of information about researchers and research projects, CANPLAINS is compiling a directory of sources for other prairie research information, including bibliographic, print, and nonprint materials. Eventually a data base will be assembled to index this print and nonprint material.

CANPLAINS also produces publications on completed research work, sponsors and publishes the results from conferences and seminars, conducts basic research, and provides consultative services. Lists of publications are available on request.

9.4 INFORMATION EXCHANGE CENTRE FOR FEDERALLY SUPPORTED RESEARCH IN UNIVERSITIES (IEC)

CENTRE D'ECHANGE DE L'INFORMATION SUR LA RECHERCHE DANS LES UNIVERSITES SUBVENTIONNEE PAR LE GOUVERNEMENT FEDERAL

Canada Institute for Scientific and Technical Information
National Research Council of Canada
Ottawa, Ontario K1A 0S2
Canada

Telephone: (613) 993–1205
Telex: 053–3115
Cable address: RESEARCH

System status: Operational system initiated in 1971
Person responsible: MR. FRED A. ZUANA, Head
Institutional affiliations:

Canada Institute for Scientific and Technical Information (CISTI)
Institut canadien de l'information scientifique et technique (ICIST)

National Research Council of Canada (NRC)
Conseil national de recherches du Canada (CNRC)

Government of Canada (principal funding organization)
Gouvernement du Canada

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: Canadian universities
Source of input: Supporting organizations (31 Federal granting bodies)

FILE DESCRIPTION:

Number of records processed annually: 9,500
New: 100% *Updated:* 0%
Number of records in active working file: 57,173 (1977)
Frequency of updating: Annual
Language of records: English and French
Data elements included: Project title, principal investigator, coinvestigators, performing organization name, performing organization address, supporting organization name, supporting organization address, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available for use by others)
Source of subject indexing: Computer

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form
Processing and storage methods: Computerized system operating on-line with magnetic tape and disk storage and processing capabilities
System software: Custom software (CAN/OLE)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: On-line access
Publications: IEC annually produces the two-volume publication *Directory of Federally Supported Research in Universities (Repertoire de la recherche dans les universites subventionnee par le gouvernement federal)* that contains the ongoing research information it collects. The latest edition, 1976–1977, is NRC No. 15896, Canadian $50.00. The directory is arranged in five parts: a listing of projects by granting agency; a listing of investigators; a fiscal breakdown by agency; a fiscal breakdown by province; and, in the second volume, a computer-produced keyword-out-of-context (KWOC) subject index of English and French terms from project titles.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations
User fees: Yes
Descriptive material: Descriptive material in English and French is available on request.

9.5 INVENTORY OF QUEBEC'S SUBSIDIZED AND FINANCED UNIVERSITY RESEARCH *INVENTAIRE DE LA RECHERCHE SUBVENTIONNEE ET COMMANDITEE DES UNIVERSITES DU QUEBEC (RECH)*

Service etudes et information
Direction generale de l'enseignement superieur
Ministere de l'Education
1035, rue de Lachevrotiere
Quebec, Quebec G1A 1J1
Canada

Telephone: (418) 643–7923

System status: Operational system initiated in 1972–73
Person responsible: MR. GASTON BARRETTE, Directeur adjoint
Institutional affiliations:
Studies and Information Division

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Canada

Service etudes et information

Higher Education Branch
Direction generale de l'enseignement superieur (DGES)

Quebec Ministry of Education
Ministere de l'Education du Quebec (MEQ)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Subnational (Province of Quebec)
Subject coverage: All fields of scientific research
Institutional coverage: Research projects subsidized, sponsored, or financed by universities in the Province of Quebec
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 4,000
Number of records in active working file: 4,000
Frequency of updating: Annual
Language of records: French and English
Data elements included: Project title, principal investigator, performing organization name, performing organization address, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)—Subject indexing is applied according to the classification and grouping of the various disciplines of teaching and relevant research, and is based on the HEGIS classification of the National Center for Educational Statistics in the United States.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form
Processing and storage methods: Computerized system operating in batch mode using an IBM 370/168 central processing unit with magnetic tape processing and storage capabilities
System software: Standard software packages and custom programs (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base
Publications: DGES compiles the report *La recherche subventionnee et commanditee dans les universities du Quebec 1972–73* and *1973–74* (latest edition), which contains statistical analyses from the project information collected. Individual project descriptions are not included. The 1974–75 report is in preparation.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations
User fees: None
Descriptive material: Descriptive material is available in French on request.

9.6 LIBRARY DOCUMENTATION CENTRE (LDC)
CENTRE DE DOCUMENTATION SUR LES BIBLIOTHEQUES (CDB)

National Library of Canada
395 Wellington Street
Ottawa, Ontario K1A 0N4
Canada

Telephone: (613) 992–7701
Telex: 053–4311 or 4312

System status: Operational system initiated in 1973
Person responsible: MISS B. L. ANDERSON, Chief
Institutional affiliations:
National Library of Canada (NLC)
Bibliotheque nationale du Canada (BNC)

International Information System on Research in Documentation (ISORID)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Information science, documentation, and library sciences research
Institutional coverage: Canadian universities and libraries
Source of input: Individual scientists

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FILE DESCRIPTION:

Number of records processed annually: 32
New: 67% *Updated:* 33%
Number of records in active working file: 21
Frequency of updating: Varies—Each project record is updated upon completion of the project or as needed.
Language of records: English, French
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords, project status

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary—The thesaurus used is developed in-house and is constantly updated to accommodate new concepts in the field. It is not in a reproducible form.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy—Input is received on ISORID Data Sheets, which were designed by Unesco.
Processing and storage methods: Manual files using card catalogs

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, Canadian libraries, and individuals
User fees: None
Descriptive material: Descriptive material is available in English and French on request.

ADDITIONAL COMMENTS

The Library Documentation Centre serves as the National Information Transfer Centre of Canada for Unesco's International Information System on Research in Documentation (ISORID).

Additional project information is available through the system in the form of progress reports and other reports written by researchers. Bibliographic citations for these reports are collected and disseminated, in addition to ongoing research information.

COLOMBIA

10.1 NATIONAL INFORMATION SYSTEM
SISTEMA NACIONAL DE INFORMACION (SNI)

COLCIENCIAS
Carrera 13 No. 60–34, Pisos 3, 4, 5
Apartado Aereo 29828 or 051580
Bogota, D.E.
Colombia

Telephone: 35 13 77, 55 25 02, or 55 18 50
Cable address: COLCIENCIAS

System status: Developmental stage, initiated in 1976
Person responsible: DR. FERNANDO CHAPARRO, Subdirector of Scientific and Technological Research
Institutional affiliations:

Colombian Fund for Scientific Research and Special Projects "Francisco Jose de Caldas"
Fondo Colombiano de Investigaciones Cientificas y Proyectos Especiales "Francisco Jose de Caldas" (COLCIENCIAS)

National Ministry of Education (principal funding organization)
Ministerio de Educacion Nacional (MINEDUCACION)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National (international at specific request)
Subject coverage: Mathematics, physics, engineering, computer sciences, electronics, materials technology, earth and space sciences, astronomy and astrophysics, chemistry, biology, medical sciences, anthropology, demography, economics, education, political science, sociology, and history research
Institutional coverage: National government agencies, other national organizations, international organizations at specific request
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 1,200
Number of records in active working file: 1,200
Frequency of updating: Annual
Language of records: Spanish
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary (available under certain conditions for use by others)—At present only medical sciences research project information is subject-indexed. Subject indexing in all other areas is planned.

Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy—At present, survey techniques are used. A system not based on surveys is under development.

Processing and storage methods: Manual files, punched cards, and a computerized system operating in batch mode with an IBM 370/145 central processing unit and magnetic tape processing and storage capabilities

System software: Standard software packages including an operating system, virtual storage, statistics, mathematics, simulation, data base system, language generator, tabulation, inconsistence analysis, project control, and others (available under certain conditions for use by others)—The data processing system is still under development, and several aspects of the system have not yet become operational.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base

Publications: COLCIENCIAS has published inventories of current research projects in basic research, social sciences, oceanography, demography and population, and medical sciences:

Investigaciones en Progreso (1974);
Estudio de Ciencias Sociales (1976);
Estudio de Ciencias del Mar (1976);
Inventario Nacional de Actividades Cientificas en Demografia y Poblacion (1975); and
Proyectos de Investigacion en Progreso en Ciencias de la Salud, 1974–1975 (1976).

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations

User fees: None at present

Descriptive material: A brochure in Spanish describing the origination and objectives of the overall COLCIENCIAS system is available on request.

ADDITIONAL COMMENTS

COLCIENCIAS has administered SNI since its inception in 1973. Ongoing research information is being added to this system, which includes information on bibliographic references and documents in the fields it covers.

COLCIENCIAS serves as the Colombian national focal point for scientific and technical information, as well as acting as its representative in several international efforts with organizations such as the Organization of American States (OAS), the United Nations Educational, Scientific and Cultural Organization (Unesco), and the National Technical Information Service (NTIS) of the U.S. Department of Commerce.

COSTA RICA

11.1 COSTA RICAN ONGOING RESEARCH INFORMATION SYSTEM (CRORIS) *SISTEMA DE INFORMACION COSTARRICENSE DE INVESTIGACIONES EN CURSO (SICRIC)*

Departamento de Informacion
y Documentacion
CONICIT
Apartado Postal 10318
San Jose
Costa Rica

Telephone: 24 41 72
Cable address: CONICIT

System status: Developmental stage, initiated in 1975
Person responsible: MRS. ZULMA P. DE VALENZUELA C., Head, Information and Documentation Department
Institutional affiliations:

Department of Information and Documentation
Departemento de Informacion y Documentacion

National Council for Scientific and Technological Research
Consejo Nacional de Investigaciones Cientificas y Tecnologicas (CONICIT)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, electronics, materials technology, earth and space sciences, chemistry, biology, medical sciences, agricultural sciences, economics, education, political science, psychology, and sociology research (eventually all fields of scientific research will be covered)
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records in active working file: 600
Frequency of updating: Annual
Language of records: Spanish
Data elements included: Project title, general project summary, project objectives, principal investigator, coinvestigators, performing organization name, research program of which project is a part, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text
Source of subject indexing: Author/investigator, information and documentation technician

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base—Additional project information is available from the system. It is dependent on the project coordinators.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations
Access limitations: Restricted to certain user groups at present
User fees: None at present

DENMARK

12.1 DANISH RESEARCH ADMINISTRATION
FORSKNINGSSEKRETARIATET

Holmens Kanal 7
1060 Copenhagen K
Denmark

Telephone: (01) 11 43 00

System status: Planning stage, initiated in 1976
Person responsible: MR. HANS MOELLER ANDERSEN, Head of Section
Institutional affiliation:
Danish Social Science Research Council

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Social sciences research initially, and later all fields of scientific research
Institutional coverage: Research institutes
Source of input: Individual scientists

FILE DESCRIPTION:

Frequency of updating: Annual (planned)
Language of records: Danish plus English project titles
Data elements included: Project title, general project summary, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, project funding, subject descriptors or keywords, manpower required, existence of resulting publications

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating on-line

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: On-line access including free-text searching

AVAILABILITY:

Types of organizations served: National government agencies, research organizations, individual scientists

ADDITIONAL COMMENTS

Under the sponsorship of the Danish Social Science Research Council, the first data collection effort for ongoing research information in the social sciences is currently underway. The first system output is expected in 1978.

ECUADOR

See Entry 1.4 under International Services.

FINLAND

13.1 TECHNICAL INFORMATION SERVICE
TEKNILLINEN INFORMAATIOPALVELULAITOS

Valtion Teknillinen Tutkimuskeskus
Vuorimiehentie 5
SF- 02150 ESPOO 15
Finland

Telephone: 90–4561
Telex: 12–2972

System status: Operational system initiated in 1973
Person responsible: MR. SAULI LAITINEN, M.S.
Institutional affiliations:
Technical Research Centre of Finland
Valtion Teknillinen Tutkimuskeskus (VTT)

Ministry of Trade and Industry
Kauppa- ja Teollisuusministerio

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National (VTT projects only)
Subject coverage: Physics, engineering, computer sciences, electronics, materials technology, earth and space sciences, chemistry, biology, medical sciences, agricultural sciences, and urban planning research
Institutional coverage: VTT projects only
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 350–400
New: 60% *Updated:* 40%
Number of records in active working file: 350–400
Frequency of updating: Annual
Language of records: Finnish with English keywords
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, security classification, type of research (basic, applied, or experimental development), stage of project, publishing and reporting plans

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary (available for use by others)—Projects are indexed by UDC notations, keywords in English and Finnish, by field according to Unesco classifications, and by objectives according to OECD classifications.

Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Computerized storage and retrieval system with magnetic tape storage and batch mode processing and retrieval capabilities

System software: Custom software (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: SDI service, statistical analyses of the data base

Publications: VTT issues internal quarterly reports containing ongoing research information. In addition, a *Yearbook* of information about projects that are not confidential is published annually. Editions for 1973 and 1974 have been published to date. In addition to a catalog of these projects, the yearbook includes general and statistical surveys, and indexes of research units, personnel, and keywords. Special reports are also available on demand.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, industry

User fees: Yes

Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

VTT carries out R & D and materials testing in the fields noted above, and employs about 400 research officers and 1,000 allied personnel. The 32 laboratories at the center are divided among three divisions: building technology and community development, materials and processing technology, and electrical and nuclear technology.

The Technical Information Service disseminates information about ongoing research and other activities, and is also responsible for publishing activities, documentation of technical knowledge, and providing liaison services for Finnish scientific attaches abroad.

The center also provides technical assistance in the planning of research and research administration, as well as compiling centralized statistics on VTT activities for authorities.

The research register of the VTT has been planned, from a data processing viewpoint, to permit extension of coverage to all national scientific and technical research activities. At the suggestion of the Ministry of Education, a committee appointed by the State Council is currently studying the possibilities of establishing such a national system.

To facilitate international exchange, translation of project titles into English is also under consideration.

FRANCE

14.1 COMPUTERS AND LAW DEPARTMENT
SERVICE INFORMATIQUE ET SCIENCES JURIDIQUES (ISJ)

Centre de documentation sciences humaines
Centre national de la recherche scientifique
54, boulevard Raspail
B.P. 140
75006 Paris
France

Telephone: 544–38–49

System status: Operational system initiated in 1971
Persons responsible: PROF. ROGER BRUNET, Directeur du CDSH
MRS. I. DE LAMBERTERIE, ISJ
Institutional affiliations:
Documentation Centre for Human Sciences
Centre de documentation sciences humaines (CDSH)

National Centre for Scientific Research
Centre national de la recherche scientifique (CNRS)

State Secretariat for Universities (principal funding organization)
Secretariat d'Etat aux Universites

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Law and computers and law research
Institutional coverage: National government agencies, other national organizations, universities
Source of input: Supporting organization (CNRS itself)—Project information is extracted from activity reports by the indexing staff, and subsequently sent to research units for review.

FILE DESCRIPTION:

Number of records processed annually: 100
New: 20% *Updated:* 80%
Number of records in active working file: 100
Frequency of updating: Biannual
Language of records: French
Data elements included: General project summary, performing organization name, supporting organization name, supporting organization address, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode
System software: SPLEEN

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval of information about ongoing research is provided from the data base other than the production of annual bulletins described below.

Publications: ISJ annually publishes the *Bulletin bibliographique, informatique et sciences juridiques* that contains references to ongoing research and to the published literature in the field. The *Bulletin ISJ 1976* has recently been published (40 F); editions for 1973 (50 F), 1974 (50 F), and 1975 (35 F) are also available.

AVAILABILITY:

Types of organizations served: University libraries, documentation specialists, students
User fees: Yes

ADDITIONAL COMMENTS

The ISJ system primarily deals with documentation and other bibliographic information in the field.

14.2 CONTRACTUAL SOCIAL SCIENCES ONGOING RESEARCH INFORMATION SYSTEM
SYSTEME D'INFORMATION SUR LES RECHERCHES EN COURS CONTRACTUELLES EN SCIENCES SOCIALES (RECOURS)

Centre de documentation sciences humaines
Centre national de la recherche scientifique
54, boulevard Raspail
B.P. 140
75006 Paris
France

Telephone: 544–38–49

System status: Planning stage, initiated in 1977 to become operational in 1979
Person responsible: PROF. ROGER BRUNET, Directeur du CDSH

Institutional affiliations:
Documentation Centre for Human Sciences
Centre de documentation sciences humaines (CDSH)

National Centre for Scientific Research
Centre national de la recherche scientifique (CNRS)

Commission for Coordination of Administrative Documentation
Commission de coordination de la documentation administrative

Prime Minister
Premiere Ministre

General Delegation for Scientific and Technical Research (principal funding organization)
Delegation generale a la recherche scientifique et technique (DGRST)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Social sciences research
Institutional coverage: National government agencies
Source of input: Individual scientists, performing organizations—Input forwarded by individual scientists is subject to review by the performing organizations concerned.

FILE DESCRIPTION:

Number of records processed annually: 2,500 are planned for the first stage
Frequency of updating: Monthly or quarterly (planned)
Language of records: French
Data elements included: Project title, general project summary, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, subject descriptors or keywords, bibliographic references, performing organization telephone number, name of contact person, name of organization managing the funds

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)—Very detailed subject indexing is not planned at present.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Computerized system operating on-line and in batch mode with IBM 370/168 central processing units and magnetic tape processing and storage capabilities, an IBM 5950 terminal, card readers, chain printers, and three IBM 3270 consoles—Computer facilities are provided in a network arrangement with CNRS research laboratory facilities.

System software: SPLEEN (Systeme de programmation logique des etudes economiques) (available under certain conditions for use by others)—This software package allows compilation of the data base, preparation of text for catalog publication, and searching on-line and in batch mode.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base, magnetic tapes, on-line access

Publications: A complete catalog of the RECOURS data base is planned for annual publication. The price and title have not yet been decided. At present a model list of contracts in progress for a potential newsletter or catalog in which projects are arranged by supporting organization and project title has been completed.

RECOURS also plans to distribute preprints of reports from completed research projects.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations

User fees: Yes

ADDITIONAL COMMENTS

The RECOURS system is presently the object of a feasibility study financed by DGRST and carried out by CDSH and the Commission de coordination de la documentation administrative. The firm establishment of the file is subject to the evaluation of the feasibility study when it is completed.

Access to the file, both on-line and in batch mode, is planned for several locations: at CNRS itself, at the Commission de coordination de la documentation administrative, at Documentation francaise, and at other national government central administration offices.

Subject coverage limited to the social sciences is planned for the first stage, but this will be extended to the exact sciences, and to completed research reports resulting from contract work, as well.

The RECOURS system is closely allied with the other CDSH research information systems. The file of Information about Doctoral Dissertations in Progress will be searchable conjointly with the RECOURS file.

14.3 CURRENT RESEARCH INFORMATION SERVICE
SERVICE D'INFORMATION SUR LES RECHERCHES EN COURS

Service recherches en cours
Centre de documentation sciences humaines
Centre national de la recherche scientifique
54, boulevard Raspail
B.P. 140
75006 Paris
France

Telephone: 544–38–49

System status: Developmental stage, initiated in 1972
Persons responsible: PROF. ROGER BRUNET, Directeur du CDSH
MRS. VERONIQUE VINCENT
Institutional affiliations:
Documentation Centre for Human Sciences
Centre de documentation sciences humaines (CDSH)

National Centre for Scientific Research
Centre national de la recherche scientifique (CNRS)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Social sciences including anthropology, demography, economics, education, political science, psychology, sociology, and humanities research
Institutional coverage: Research units sponsored by CNRS in the social sciences and humanities
Source of input: Supporting organization (CNRS itself)—Project information is extracted from activity reports by the indexing staff, and subsequently sent to research units for review.

FILE DESCRIPTION:

Number of records processed annually: 150
New: 33% *Updated:* 67%
Number of records in active working file: 450
Frequency of updating: Annual
Language of records: French
Data elements included: Project title, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, subject descriptors or keywords, performing organization telephone number and head

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and a computerized system operating in batch mode with an IBM 370/168 central processing unit and magnetic tape processing and storage capabilities
System software: SPLEEN SEGUR (available under certain conditions for use by others)—This software is used at present only in the production of indexes. It will be changed when production of the publications described below becomes completely automated.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval of information about ongoing research is provided from the data base beyond the production of the publications described below.
Publications: CNRS annually publishes the *Annuaire sciences de l'homme,* which contains ongoing research information as an integral part of entries describing research units. The current edition, published in Paris in 1977, is 50 francs (ISBN 2 222 02135 9). It covers 450 research units sponsored by CNRS in the field.

AVAILABILITY:

Types of organizations served: CNRS-sponsored research units, national government agencies, current research information services
User fees: Yes
Descriptive material: Descriptive material in French is available on request.

ADDITIONAL COMMENTS

The basic function of this portion of CDSH activities is to provide a data base containing information about research units sponsored by CNRS in the social sciences and humanities. Ongoing research information is an integral component of the data collected about each unit.

Other directories similar to the *Annuaire* contain information about research units sponsored by CNRS in mathematics and physics, chemistry, life sciences, and earth and space sciences. These directories are published with biannual updating of entries.

The section responsible for production of all five directories at present is the Department of External Relations and Information *(Department des relations exterieures et de l'information).*

Current plans are underway to automate production of all five directories using the SPLEEN VIRA software packages at CDSH. At that time additional retrieval services are expected to become available.

14.4 DATA BANK ON RESEARCH IN THE FIELD OF THE ENVIRONMENT

BANQUE DE DONNEES SUR LES RECHERCHES MENEES DANS LE DOMAINE DE 1'ENVIRONNEMENT

Institut national de la sante et de la recherche medicale
78, rue du General Leclerc
94270 Le Kremlin-Bicetre
France

Telephone: 677-65-00

System status: Developmental stage, initiated in 1977
Person responsible: MRS R GERDAY, Directeur du service
Institutional affiliations:

National Institute for Health and Medical Research
Institut national de la sante et de la recherche medicale (INSERM)

Ministry of Health
Ministere de la sante

Ministry of Culture and the Environment (principal funding organization)
Ministere de la culture et de l'environnement

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Medical sciences research
Institutional coverage: National government agencies (Ministry of Culture and the Environment only)
Source of input: Supporting organization

FILE DESCRIPTION

Number of records processed annually: 1,000
New: 100% *Updated:* 0%—Later a 50%-50% ratio is expected.
Number of records in active working file: 1,000—The active file is expected to include five years' data, approximately 5,000 project records.
Frequency of updating: Annual
Language of records: French
Data elements included: Project title, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, project equipment owned by the service, number of bibliographic references, research results data

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical and nonhierarchical vocabularies (available for use by others)—Vocabulary words are organized into numerical or alphabetical classes. For some alphabetical classes, such as sex or route of administration where only a few variables are possible, the vocabulary is fixed and nonhierarchical. For others, the vocabulary may be standardized as required.

Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Punched cards and a computerized system operating on-line with an IBM central processing unit and magnetic tape and disk processing and storage—Input is accomplished using punched cards.

System software: System 2000 software packages (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, on-line access

AVAILABILITY:

Types of organizations served: National government agencies and other public organizations

Access limitations: Restricted to certain user groups

User fees: None at present

ADDITIONAL COMMENTS

This system is part of a larger toxicological data bank that contains detailed data on experimental toxicology which have been extracted from published literature, as well as synthesized toxicological, physico-chemical, and official data extracted from manuals.

The system will also process reports of research contracts sponsored by the Ministry of Culture and the Environment covering information on the effects of toxic substances which may cause pollution.

14.5 DOCUMENTATION CENTRE
CENTRE DE DOCUMENTATION

Electricite de France
1, avenue du General de Gaulle
B.P. 408
92141 Clamart Cedex
France

Telephone: 645–21–61
Telex: 270400 F EDFERIM

System status: Operational system initiated in 1975
Person responsible: MR. JEAN PUPPONI, Chef
Institutional affiliations:

Information and Applied Mathematics Department
Service informatique et mathematiques appliquees

Study and Research Administration
Direction des etudes et recherches

Electricite de France (EDF)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, computer sciences, electronics, electrotechnics, materials technology, and chemistry research
Institutional coverage: EDF-supported research only
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 500
Number of records in active working file: 500
Language of records: French
Data elements included: Project title, general project summary, performing organization name, performing organization address, supporting organization name, supporting organization address, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode and on-line using an IBM 370/168 central processing unit with IBM 3300-1 disk packs
System software: GID (Gestion de l'information documentaire) software created at EDF

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, magnetic tapes, on-line access

AVAILABILITY:

Types of organizations served: EDF staff and, under certain conditions, outside users
Access limitations: Restricted to certain user groups
User fees: None
Descriptive material: Descriptive material in French is available on request.

ADDITIONAL COMMENTS

The Documentation Centre of Electricite de France is not particularly oriented toward ongoing research information. However, it does contain bibliographic descriptions of external research of all kinds, and internal information on projects conducted by the organization. All research projects are analyzed from a bibliographic point of view. Information is collected from all the different departments within the organization. The bibliographic files and services are extensive; holdings now include citations for more than 130,000 documents.

14.6 DOCUMENTATION CENTRE ON URBANISM
CENTRE DE DOCUMENTATION SUR L'URBANISME (CDU)

2, avenue du General Malleret-Joinville
94114 Arcueil Cedex
France

Telephone: 581-12-12

System status: Operational system initiated in 1975
Person responsible: MR. JEAN-CLAUDE DAUMAS, Directeur d'etudes
Institutional affiliations:
Technical Service for Urbanism
Service technique de l'urbanisme (STU)

International Economic Affairs Department
Service des affaires economiques internationales (SAEI)

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France

Mission for Urban Research
Mission de la recherche urbaine

Ministry of Equipment
Ministere de l'Equipement

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Urban and regional development research in France including demography, economics, political science, and sociology
Institutional coverage: National government agencies and universities
Source of input: Performing organizations, supporting organizations—There are two main sources: financing organizations, through contracts analysis, and lists supplied by the Fichier central des theses, through the Centre national de la recherche scientifique (CNRS).

FILE DESCRIPTION:

Number of records processed annually: 250–300
Number of records in active working file: 1,500
Language of records: French
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, subject descriptors or keywords, city or geographic region under study

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available under certain conditions for use by others)—The indexing system includes a hierarchical dictionary with syntax designations which makes it possible to express the syntactical relationships between keywords, and the weighting to be given to keywords.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode with an IRIS 80 (CII) central processing unit and disk processing and storage capabilities
System software: Two standard software packages are used: ISARD-CDU for input and correction of data, and SATIN 1 for file interrogation and output. These packages are available under certain conditions for use by others.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, magnetic tapes

Publications: In 1975 CDU assumed responsibility for publication of *Fiches analytiques de la recherche urbaine en France* which contains ongoing research information. The latest edition covers 1974–1975, and was edited by Mrs. M. D. Brechignac. Project descriptions are accompanied by indexes for organization acronyms, organization names and addresses, investigators, and subjects. The periodical is available in both hard copy and microfiche.

This inventory of current research in urban and regional development was originally launched by the group of experts in the field of the Comite de l'habitat, de la construction et de la planification of the Commission economique pour l'Europe (CEE) of the United Nations. It is produced by CDU for the Mission de la recherche urbaine, Service des affaires economiques internationales (SAEI), which serves as the French coordinating center for urban research in the international network being developed by the committee. SAEI published the first two editions of the inventory; copies of these are still available.

In principle, similar inventories are to be completed in 27 CEE member countries by "focal point" organizations such as SAEI. These inventories will then be exchanged among the focal point groups for further dissemination.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations (particularly urban and regional planning agencies and their documentation centers)

User fees: None

Descriptive material: A brochure and other descriptive material in French are available on request.

ADDITIONAL COMMENTS

Ongoing research activities form only part of a larger documentation system operated by CDU. It processes in addition information about bibliographic materials in the field such as progress and final reports, monographs, periodicals, and legal texts, and provides a full range of search services for its data bases.

The documentation activities of CDU are coordinated with those of similar centers in Provence and Paris. Together these files constitute the national data base for information about urban and regional development in France.

14.7 EUROPEAN DOCUMENTATION AND INFORMATION SYSTEM FOR EDUCATION (EUDISED)

SYSTEM EUROPEEN DE DOCUMENTATION ET INFOMATION PEDAGOGIQUES

Centre de documentation sciences humaines — *Telephone:* 544–38–49 (CDSH/CNRS)
Centre national de la recherche scientifique
54, boulevard Raspail
B.P. 140
75006 Paris
France

Department des etudes et recherches appliquees — *Telephone:* 329–21–64 (DERA/INRP)
aux enseignement generaux et a la vie scolaire
Institut national de recherche pedagogique
29, rue d'Ulm
75230 Paris Cedex 05
France

System status: Operational system initiated in 1975
Persons responsible: PROF. ROGER BRUNET, Directeur du CDSH
MR. L. LEGRAND, Directeur du recherche, INRP
Institutional affiliations:

Documentation Centre for Human Sciences
Centre de documentation sciences humaines (CDSH)

National Centre for Scientific Research
Centre national de la recherche scientifique (CNRS)

Department of Studies and Research Applied to General Education and to School Life
Departement des etudes et recherches appliquees aux enseignement generaux et a la vie scolaire (DERA)

National Institute for Education Research
Institut national de recherche pedagogique (INRP)

European Documentation and Information System for Education (EUDISED)
Systeme europeen de documentation et d'information pedagogiques

Council of Europe
Conseil de l'Europe

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Education research
Institutional coverage: National government agencies, other national organizations
Source of input: Individual scientists and research teams

FILE DESCRIPTION:

Number of records processed annually: 250
New: 60% *Updated:* 40%
Number of records in active working file: 600
Frequency of updating: Annual
Language of records: French
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start and end date, supporting organization name, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical and nonhierarchical vocabularies (available for use by others)—In addition to terms from the EUDISED thesaurus, terms from related subject areas and specific national terms will be added to project records.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system with IBM equipment
System software: SPLEEN

SYSTEM SERVICES

INFORMATION SERVICES

Retrieval services provided: Searches of the current file, SDI service, magnetic tapes
Publications: Ongoing research information collected by CNRS and INRP is included in the *EUDISED R & D bulletin* of the parent system, and is summarized in the *Annuaire sciences de l'homme* of CNRS.

AVAILABILITY:

Types of organizations served: National govenment agencies, other national organizations, foreign organizations, international organizations, private firms
User fees: Yes
Descriptive material: Descriptive material in English, French, and German is available on request.

ADDITIONAL COMMENTS

CNRS and INRP act as the national center in France for the EUDISED system of the Council of Europe. Participants in the EUDISED system are the 22 European Cultural Convention member states. Other information available in the EUDISED system, which is still under development, covers audio-visual materials and educational periodicals.

14.8 FRENCH ASSOCIATION OF RESEARCH INSTITUTES FOR DEVELOPMENT *ASSOCIATION FRANCAISE DES INSTITUTS DE RECHERCHE SUR LE DEVELOPPEMENT (AFIRD)*

58, boulevard Arago
75013 Paris
France

Telephone: 331–28–01 and 331–38–16

System status: Developmental stage, initiated in 1975
Person responsible: DR. Y. GOUSSAULT, Secretaire General
Institutional affiliations:
Institute for Studies of Economic and Social Development (principal funding organization)
Institut d'etude du developpement economique et social (IEDES)

DEVSIS (planned)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National—International coverage is planned.
Subject coverage: Economic, political, and social sciences research in developing countries except the African research information collected by the Centre d'analyse et de recherches documentaires pour l'afrique noire (CARDAN)
Institutional coverage: National government agencies, other national organizations
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 450
Number of records in active working file: 450
Frequency of updating: Biennial
Language of records: French
Data elements included: Project title, general project summary, project objectives, progress reports, principal investigator, coinvestigator, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, subject descriptors or keywords, performing organization director, courses offered pertaining to the project, performing organization telephone number, cooperating organizations, research group name, performing organization periodical review title

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed nonhierarchical vocabulary (available under certain conditions for use by others)—Use of the DEVSIS Macrothesaurus is planned.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files—The DEVSIS system will be computerized.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: AFIRD publishes the *Bulletin de liaison* quarterly (100 francs/year plus overseas postage, if necessary). One issue every two years contains descriptions of research projects in the field, as well as investigator, geographic, performing organization, supporting organization, and theme indexes. The first such issue was No. 4, November 1976, 35 F, ISSN 0395 4064, *Inventaire des recherches en cours sur le developpement.* Other issues of the bulletin include the results of similar surveys that identify doctoral theses, courses and curricula, research institutes, and documentation centers of interest. The bulletin also contains a calendar of symposia, colloquia, and other meetings, lists of publications of meeting proceedings, and additional items about teaching, research, and documentation in Third World studies.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
User fees: Fees are charged for the publications listed above; no fees are charged for other retrieval services.
Descriptive material: Descriptive material in French is available on request. English translations are being prepared.

ADDITIONAL COMMENTS

AFIRD has as its objectives the improvement and coordination of national, and later international, efforts in the field of Third World studies. To accomplish these aims, AFIRD is conducting surveys of research projects, research institutes, and documentation centers to include in the *Bulletin de liaison* (see above). AFIRD acts as a national focal point for interested organizations in France, and as a central contact in France for similar organizations throughout the world. It sponsors round tables and other conferences as well.

14.9 FUNDS FOR RESEARCH SPONSORSHIP *FONDS D'AIDE A LA RECHERCHE*

Service inventaire
Delegation generale a la recherche scientifique
et technique
35, rue Saint-Dominique
75700 Paris
France

Telephone: 550-32-50
Telex: 204 643 F

System status: Operational system initiated in 1973
Person responsible: MR. Y. BLAIZOT, Chef
Institutional affiliations:
General Delegation for Scientific and Technical Research
Delegation generale a la recherche scientifique et technique (DGRST)

State Secretariat for Research
Secretariat d'Etat a la Recherche

Prime Minister
Premiere Ministre

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National (DGRST-sponsored research only)
Subject coverage: Physics, engineering, electronics, materials technology, earth and space sciences, astronomy and astrophysics, chemistry, medical sciences, economics, education, political science, and sociology research
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations, and industrial research organizations that conduct research sponsored by DGRST
Source of input: Supporting organization (DGRST only)

FILE DESCRIPTION:

Number of records processed annually: 1,700–2,000
New: 80% *Updated:* 20%
Number of records in active working file: 2,500–3,000
Frequency of updating: Varies
Language of records: French
Data elements included: Project title, project objectives, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, categorization according to sectoral groups of the national economic plan

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available under certain conditions for use by others)—Projects are indexed according to three parameters: sector of the national economic plan, general discipline (one of 31), and more detailed subject index terms chosen from a multidisciplinary thesaurus of about 9,000 terms.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode with an IRIS 80 double processor, Lourd TL 15 terminal, and magnetic tape and punched card processing and storage—The system is operated by the Centre de calcul of the Ministere de l'industrie et de la recherche.
System software: Custom software (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, microfiche (planned)

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations
User fees: None

14.10 INFORMATION ABOUT DOCTORAL DISSERTATIONS IN PROGRESS
INFORMATION SUR LES DOCTORATS D'ETAT EN COURS

Centre de documentation sciences humaines
Centre national de la recherche scientifique
54, boulevard Raspail
B.P. 140
75006 Paris
France

Telephone: 544-38-49

System status: Operational system initiated in 1971
Persons responsible: PROF. ROGER BRUNET, Directeur du CDSH
MRS. VERONIQUE VINCENT
Institutional affiliations:

Documentation Centre for Human Sciences
Centre de documentation sciences humaines (CDSH)

National Centre for Scientific Research
Centre national de la recherche scientifique (CNRS)

State Secretariat for Universities (principal funding organization)
Secretariat d'Etat aux Universites

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Social sciences including anthropology, demography, economics, education, political science, psychology, sociology, and humanities research undertaken for doctoral dissertations
Institutional coverage: Domestic universities
Source of input: Individual scientists (doctoral candidates)

FILE DESCRIPTION:

Number of records processed annually: 1,000
New: 50% *Updated:* 50%
Number of records in active working file: 7,500
Frequency of updating: Annual
Language of records: French
Data elements included: Project title, principal investigator, performing organization name, project start date and end date, subject descriptors or keywords, degree for which project is being conducted, supervisor's name

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Only broad subject areas are used for subject indexing (available for use by others).
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode with an IBM 370/168 central processing unit and magnetic tape processing and storage capabilities
System software: CARAT (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Magnetic tapes
Publications: CDSH compiles an annual printout for publication of the *Repertoire raisonne des doctorats d'etat lettres et sciences humaines inscrits en France.* This volume is published by the Secretariat d'Etat aux Universites (Paris, latest edition October 1970 to May 1976, no charge). It lists doctoral research projects for five-year periods in the human sciences fields. Similar directories are planned for doctoral research projects in the fields of law, economics, political science, and management sciences.

AVAILABILITY:

Types of organizations served: University libraries and departments, research institutions and centers
User fees: None
Descriptive material: Descriptive material in French is available on request.

ADDITIONAL COMMENTS

Information about Doctoral Dissertations in Progress is a joint venture of CDSH and the Fichier central des theses, Universite de Paris-X, 200, avenue de la Republique, 92000 Nanterre, France.

14.11 LABORATORY OF INFORMATION AND DOCUMENTATION IN GEOGRAPHY
LABORATOIRE D'INFORMATION ET DE DOCUMENTATION EN GEOGRAPHIE (INTERGEO)

Centre national de la recherche scientifique
191, rue Saint-Jacques
75005 Paris
France

Telephone: 633–74–31

System status: Developmental stage, initiated in 1967
Person responsible: MISS A. M. BRIEND
Institutional affiliation:
National Centre for Scientific Research
Centre national de la recherche scientifique (CNRS)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Geography research
Institutional coverage: National organizations other than national government agencies
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 400–500
Number of records in active working file: 1,300 (1973)
Language of records: French
Data elements included: Project title, principal investigator, performing organization name, performing organization address, subject descriptors or keywords, principal investigator's telephone number, degrees, current position, current fields of interest, region of study

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)—Project information in the *INTERGEO bulletin* described below is not subject indexed; indexing is performed only in conjunction with production of the *Annuaire des geographes de la France et de l'Afrique francophone.*
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Punched cards and printed lists

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: INTERGEO does not provide retrieval services for ongoing research information beyond production of the publications listed below.

Publications: INTERGEO regularly publishes the following periodicals containing ongoing research information:

INTERGEO bulletin—A quarterly journal published since 1966, the bulletin (ISSN 0396 5880) contains one issue each year listing ongoing research project titles by principal investigator name, as well as lists of dissertations. Other issues of the bulletin contain lists of congresses and symposia inside and outside France of interest to geographers; one issue reviews the organization and teaching of the subject in French universities; and continuing coverage is provided for reports of meetings and activities of different institutions and associations, especially the Comite national des geographes francais and its different national commissions. Activities of the Centre national de la recherche scientifique and other research centers are also covered. The current price for the *INTERGEO bulletin* is 34 francs (domestic), 38 francs (foreign);

Annuaire des geographes de la France et de l'Afrique francophone—This is a directory of French and French African geographers that lists, in addition to current research project titles, professional titles, functions, areas of interest, addresses, theses titles, and geographic areas of interest. The 1973 edition (40 francs) contained entries for 1,300 geographers. An update of the directory was published in the *INTERGEO bulletin* No. 40 in 1975; this issue is 14 francs. Subject and geographic location indexes accompany the *Annuaire*.

AVAILABILITY:

User fees: Yes
Descriptive material: Descriptive material in French and English is available on request.

14.12 NETWORK ARRANGEMENT OF TOPICS ACCORDING TO THEIR RESPECTIVE ENVIRONMENTAL CONNOTATIONS
ARRANGEMENT RETICULE DES INFORMATIONS POUR L'APPROCHE DES NOTIONS PAR LEUR ENVIRONNEMENT (ARIANE)

Institut national de la recherche agronomique
149, rue de Grenelle
75341 Paris Cedex 07
France

Telephone: 550–32–00
Telex: 204719 F
Cable address: RECHERCHAGRO

System status: Limited experiment, initiated in 1975
Person responsible: DR. GILBERT JOLIVET, Inspecteur General

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France

Institutional affiliations:

Experimentation and Information Service
Service d'experimentation et d'information (SEI)

National Institute of Agricultural Research
Institut national de la recherche agronomique (INRA)

National Bureau for Scientific and Technical Information (principal funding organization)
Bureau national de l'information scientifique et technique (BNIST)

Technical Assistance and Documentation Centre
Centre d'assistance technique et de documenation (CATED)

Ministry of Agriculture
Ministere de l'agriculture

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Agricultural sciences research
Institutional coverage: National government agencies (part of INRA only in this limited experiment)
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records in active working file: 485
Language of records: French
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, contract, grant, or project number assigned, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text—Under the ARIANE system, word terms are arranged in networks, and retrieval can be accomplished through term associations in the network.
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Computerized system operating in batch mode and on-line with a IBM 370/158 central processing unit and disk storage and processing capabilities—This system is operated by CATED, Federation nationale du batiment, 6, rue La-Perouse, 75016 Paris, France.

System software: ARIANE (available under certain conditions from CATED for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: SDI service, on-line access

AVAILABILITY:

Types of organizations served: National government agencies (INRA only at present)

Access limitations: Restricted to this user group

User fees: None

Descriptive material: Descriptive material in French is available on request.

ADDITIONAL COMMENTS

INRA contributes ongoing research project information to the Permanent Inventory of Agricultural Research Projects (AGREP) of the Commission of the European Communities (CEC), and to the Current Agricultural Research Information System (CARIS) of the Food and Agriculture Organization of the United Nations (FAO).

The ARIANE system, which is owned by CATED, was originally developed to process information about construction and public works projects in France. Under this INRA experiment, the system was adapted to handle ongoing research project information.

INRA has also intensively developed the French agricultural thesaurus AGRIDOC, which is used for document indexing.

GERMAN DEMOCRATIC REPUBLIC

15.1 REGISTRATION SERVICE IN INFORMATION AND DOCUMENTATION *REGISTRIERDIENST INFORMATION/DOKUMENTATION*

Zentralinstitut fuer Information und
Dokumentation der Deutschen Demokratischen
Republik
Koepenicker Strasse 325
1170 Berlin
German Democratic Republic

Telephone: 65760
Telex: OWU 11307
Cable address: ZENIID Berlin

System status: Planning stage, initiated in 1977
Person responsible: MR. OCH, Director
Institutional affiliations:
Central Institute for Information and Documentation of the German Democratic Republic
Zentralinstitut fuer Information und Dokumentation der Deutschen Demokratischen Republik

International Information System on Research in Documentation (ISORID)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Information science, documentation, and library science research
Institutional coverage: National organizations other than national government agencies
Source of input: Supporting organizations

FILE DESCRIPTION:

Language of records: German
Data elements included: Project title, general project summary, project objectives, performing organization name, bibliographic references

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

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AVAILABILITY:

Types of organizations served: National government agencies, other national organizations

ADDITIONAL COMMENTS

The Registrierdienst Information/Dokumentation is planning to develop as the National Information Transfer Centre for the ISORID program for the German Democratic Republic.

GERMANY, FEDERAL REPUBLIC OF

16.1 CENTRE FOR AGRICULTURAL DOCUMENTATION AND INFORMATION
ZENTRALSTELLE FUER AGRARDOKUMENTATION UND -INFORMATION (ZADI)

Konstantinstrasse 110
5300 Bonn 2
Federal Republic of Germany

Telephone: (0 22 21) 33 00 41–44

System status: Operational system initiated in 1970
Person responsible: DR. E. MUELLER
Institutional affiliations:

Federal Ministry of Food, Agriculture and Forestry
Bundesministerium fuer Ernaehrung, Landwirtschaft und Forsten

Permanent Inventory of Agricultural Research Projects (AGREP)

Council of Europe
Conseil de l'Europe

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Agricultural sciences research including animal production, veterinary science, food science, forestry, and lumber industry science
Institutional coverage: National government agencies, other national organizations, state agencies, universities, and other research organizations
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 7,000
New: 35% *Updated:* 65%
Number of records in active working file: 7,000
Frequency of updating: Annual
Language of records: German and English
Data elements included: Project title, principal investigator, coinvestigators, performing organization name, project start date and end date, supporting organization name, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary (available under certain conditions for use by others)

Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy—Information is collected by questionnaire.

Processing and storage methods: Computerized system operating on-line using a Siemens central processing unit with magnetic tape processing and storage capabilities

System software: Siemens GOLEM II (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: On-line access

Publications: ZADI annually compiles ongoing research information for the following publications:
Forschungsvorhaben im Bereich der Landbau-, Ernaehrungs-, Forst- und Holzwirtschaftswissenschaften sowie der Veterinaermedizin:
Teil I, Landbauwissenschaften (ohne Tierische Produktion), 1975–76;
Teil II, Tierische Produktion/Veterinaermedizin, 1975–76;
Teil III, Ernaehrungswissenschaften, 1975–76; and
Teil IV, Forst- und Holzwirtschaftswissenschaften, 1975–76.
Other publications of ZADI are:
Forschungsstaettenverzeichnis, 1977 (not yet printed); and the
Tagungskalender, published annually.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations

User fees: Fees are charged to private users.

ADDITIONAL COMMENTS

ZADI also processes bibliographic information and contributes input to the AGRIS and AGREP data bases.

The center is testing new methods of data input. The subject index references contain hierarchical combinations of terms and are part of an effort to compile a controlled vocabulary in the agricultural sciences. The center has also participated in the AGRINDEX study in cooperation with the Centrum voor Landbouwpublicaties en Landbouwdokumentatie (Pudoc/Wageningen). This study was initiated by EC.

16.2 DATA BANK FOR ENVIRONMENTAL RESEARCH
UMWELTFORSCHUNGSDATENBANK (UFORDAT)

Umweltbundesamt
Bismarckplatz 1
1000 Berlin 33
Federal Republic of Germany

Telephone: (030) 89 03–1
Telex: 183756

System status: Operational system initiated in 1975
Person responsible: PROF. JUERGEN SEGGELKE, Direktor
Institutional affiliations:

Information and Documentation System for the Environment
Informations- und Dokumentationssystem Umwelt (UMPLIS)

Federal Environmental Agency
Umweltbundesamt (UBA)

Federal Ministry of the Interior
Bundesministerium des Innern (BMI)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Environmental sciences research
Institutional coverage: National government agencies, international organizations, state government agencies
Source of input: Performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 5,300
New: 87% *Updated:* 13%
Number of records in active working file: 6,400
Frequency of updating: Varies from daily to biennial
Language of records: German
Data elements included: Project title, general project summary, principal investigator, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, project number assigned, project funding, subject descriptors or keywords, bibliographic references, performing organization telephone and telex numbers, project status, performing organization leader, data sources, geographic coverage, models used, associated institutions

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available under certain conditions for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form
Processing and storage methods: Computerized system operating in batch mode and on-line with a Siemens 7.755 central processing unit, Siemens disk packs with 100 million bytes of storage, magnetic tape, punched cards, and Siemens terminals
System software: FIDAS/IDAS and GOLEM (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base, magnetic tapes, on-line access
Publications: In conjunction with other organizations, the Umweltbundesamt produces the *Umweltforschungskatalog (UFOKAT)* that contains descriptions of ongoing research projects in the field. The 1976 edition, *UFOKAT '76* (Berlin: Erich Schmidt Verlag, 1976, ISBN 3 503 01 186 2, 85,-DM), contains descriptions of 5,300 projects active up to August 1976 that were sponsored by Federal and state government agencies. In addition to the project descriptions, which are arranged by subject chapters, the catalog contains a listing and descriptions for research organizations, plus indexes for investigators and research organization leaders, performing organizations by location, supporting organizations, keywords, and geographic locations of the projects.

Future editions of the catalog may include descriptions of research projects in environmental sciences that are being sponsored by private industry and other private organizations, in addition to government-sponsored work.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
User fees: None
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

UFORDAT is one part of the overall UMPLIS system which is being established to provide appropriate and necessary information on the environment. In addition to compiling its own data banks, UMPLIS is functioning as a referral center for existing data sources.

UMPLIS produced an inventory of information and documentation centers, *Verzeichnis der Informations- und Dokumentationsstellen fuer Umweltliteratur,* in 1975, and is publishing an inventory of institutions which are involved in environmental protection activities, *Behoerdenverzeichnis Umwelt,* in

1978. Other services planned include data banks for environmental literature and law, a library, and a data processing system.

16.3 DOCUMENTATION ON ONGOING RESEARCH PROJECTS ON OCCUPATIONAL SAFETY AND HEALTH
FORSCHUNGS-PROJEKT-DOCUMENTATION DES ARBEITSSCHUTZES (FODOK)

Bundesanstalt fuer Arbeitsschutz und
Unfallforschung
Vogelpothsweg 50–52
Postfach 17 02 02
4600 Dortmund 1 (Dorstfeld)
Federal Republic of Germany

Telephone: (0231) 17631

System status: Developmental stage
Person responsible: MR. K. THORN, Officer in Charge
Institutional affiliations:
Federal Institute for Occupational Safety and Accident Research
Bundesanstalt fuer Arbeitsschutz und Unfallforschung (BAU)

Federal Ministry of Labour and Social Affairs
Bundesministerium fuer Arbeit und Sozialordnung (BMA)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National—In addition to collection of information about national projects, FODOK has access to other project information through exchange agreements with the Smithsonian Science Information Exchange, Inc. (SSIE) in Washington D.C. and the Institut national de recherche et de securite pour la prevention des accidents du travail et des maladies professionelles (INRS) in Paris.
Subject coverage: Research on all professional, educational, and recreational activities of man as they pertain to accident prevention
Institutional coverage: National government agencies, other national organizations, foreign organizations
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 300
New: 50% *Updated:* 50%
Number of records in active working file: 300
Language of records: German
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end

date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, potential practical applications of research, expected new information, costs, project incentive, manpower demands, financial plan

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Free index terms updated and presented by the system (available for use by others)
Source of subject indexing: Computer

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy—The input data sheets are converted into an OCRB form.
Processing and storage methods: Computerized Siemens 7000, BS2000 time-sharing system with disk storage and on-line access using a Siemens Transdata terminal/printer
System software: GOLEM II (Grossspeicherorientierte, listenorganisierte Ermittlungsmethode)—This is a Siemens retrieval software package (available from Siemens for use by others).

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: On-line access

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations
Access limitations: General availability restricted to certain data elements
User fees: None at present

16.4 INFORMATION SYSTEM IN INFORMATION SCIENCE R & D PROJECTS DATA BASE IN THE FEDERAL REPUBLIC OF GERMANY
INFORMATIONSSYSTEM INFORMATIONSWISSENSCHAFT, PROJEKTDATEI BUNDESREPUBLIK DEUTSCHLAND (ISORID - DE)

Dokumentationszentrum fuer
Informationswissenschaften
Westendstrasse 19
6000 Frankfurt am Main 1
Federal Republic of Germany

Telephone: (0611) 747844

System status: Developmental stage, initiated in 1975
Person responsible: DR. BRIGITTE ENDRES-NIGGEMEYER

Germany, Federal Republic of

Institutional affiliations:

Documentation Centre for Information Science
Dokumentationszentrum fuer Informationswissenschaften (ZDOK)

German Society for Information Science
Deutsche Gesellschaft fuer Dokumentation e. V. (DGD)

Federal Ministry for Research and Technology (principal funding organization)
Bundesministerium fuer Forschung und Technologie (BMFT)

International Federation for Documentation
Federation internationale de documentation (FID)

International Information System on Research in Documentation (ISORID)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Information science, documentation, and library science research
Institutional coverage: National government agencies, universities, private industry
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records in active working file: 400
Frequency of updating: Annual
Language of records: German
Data elements included: Project title, general project summary, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available under certain conditions for use by others)
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system with disk storage and on-line processing and retrieval capabilities using a Siemens 4004/151 central processing unit and a Siemens Scandata optical reader
System software: FIDAS, EDOR (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, on-line access
Publications: A research register containing ongoing research information is issued annually. Other periodic publications containing ongoing research information are planned.

AVAILABILITY:

Types of organizations served: Not known at present
User fees: Yes

ADDITIONAL COMMENTS

As a National Information Transfer Centre (NTIC) for ISORID, ISORID – DE forwards data about ongoing projects and research reports in the field of information and documentation research to FID for publication in *R & D Projects in Documentation and Librarianship* and subsequent inclusion in the ISORID data base.

16.5 ONGOING RESEARCH PROJECT DATA BANK
DATENBANK FUER FOERDERUNGSVORHABEN (DAVOR)

Bundesministerium fuer Forschung und Technologie
Postfach 12 03 70
5300 Bonn 12
Federal Republic of Germany

Telephone: (0 22 21) 59 33 34
Telex: 88 56 74 bmft d

System status: Operational system initiated in 1972
Person responsible: MR. HANS-PETER HEINRICH, Regierungsdirektor
Institutional affiliation:
Federal Ministry for Research and Technology
Bundesministerium fuer Forschung und Technologie (BMFT)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, computer sciences, electronics, materials technology, earth and space sciences, astronomy and astrophysics, biology, medical sciences, economics, political science, and sociology research
Institutional coverage: All projects funded by BMFT
Source of input: Supporting organization

FILE DESCRIPTION:

Number of records processed annually: 4,000
New: 50% *Updated:* 50%
Number of records in active working file: 10,000 (1977)
Frequency of updating: Monthly
Language of records: German
Data elements included: Project title, general project summary, project objectives, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff with and without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system utilizing a Siemens 4006/7748 central processing unit and disk storage with on-line processing capabilities
System software: FIDAS—This software package is produced by the Gesellschaft fuer Mathematik und Datenverarbeitung (GMD), Schloss Birlinghoven, 5205 Saint Augustin 1, Federal Republic of Germany. It is available under certain conditions for use by others.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base
Publications: DAVOR issues the *BMFT Foerderungskatalog* annually which contains information about ongoing research projects.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, and others
User fees: None
Descriptive material: A brochure describing DAVOR in German is available on request.

16.6 STUDIES ON DEVELOPING COUNTRIES: BIBLIOGRAPHY OF GERMAN RESEARCH ON DEVELOPING COUNTRIES
ENTWICKLUNGSLAENDER-STUDIEN: BIBLIOGRAPHIE DER DEUTSCHEN ENTWICKLUNGSLAENDER-FORSCHUNG

Zentrale Dokumentation
Deutsche Stiftung fuer internationale Entwicklung
Endenicher Strasse 41
5300 Bonn 1
Federal Republic of Germany

Telephone: (0 22 21) 63 18 81
Telex: 88 67 10

System status: Operational system initiated in 1966
Person responsible: MR. E. J. VON LEDEBUR, Leiter der Zentralen Dokumentation
Institutional affiliation:
German Foundation for International Development
Deutsche Stiftung fuer internationale Entwicklung

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Materials technology, agricultural sciences, and social sciences research including demography, economics, education, political science, and sociology as they pertain to developing countries
Institutional coverage: National government agencies, other national organizations
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 600
New: 100% *Updated:* 0%
Number of records in active working file: 5,000
Frequency of updating: Updates are seldom made.
Language of records: German
Data elements included: Project title, general project summary, project objectives, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, project funding, subject descriptors or keywords, bibliographic references, language and confidentiality of records, place of publication for bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff with scientific background using the *Thesaurus fuer wirtschaftliche und soziale Entwicklung* (*Thesaurus for Economical and Social Development)*

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files, punched tape
System software: Custom software for production of some indexes

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

Publications: The Deutsche Stiftung fuer internationale Entwicklung annually publishes *Entwicklungslaender-Studien: Bibliographie der deutschen Entwicklungslaender-Forschung* (latest edition 1977, Bonn) containing ongoing research information.

This bibliography of research on developing countries attempts to give a constantly updated overview of both completed and ongoing research on problems concerning developing countries and development policies. Most of the information and data for the latest publication was obtained from questionnaires completed by participating institutions from two other information centers, the Information Centre for Social Sciences Research *(Informationszentrum fuer sozialwissenschaftliche Forschung, IZ)* and the Centre for Agrarian Documentation and Information *(Zentralstelle fuer Agrardokumentation und -information, ZADI)*, both located in Bonn-Bad Godesberg. Other institutions supplied information directly to the Deutsche Stiftung fuer internationale Entwicklung.

The contents of these questionnaires were abstracted and keyed to subject matter and geographical descriptors. Part A contains an index of research institutes, an index of authors, a subject matter index, and a geographical index. These indexes were compiled with the help of electronic data processing.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, universities
User fees: None

ADDITIONAL COMMENTS

The Deutsche Stiftung fuer internationale Entwicklung is part of the larger Information System on Developing Countries/Developing Policy which collects and disseminates information about published literature, researchers and other experts, meetings, and conferences in the field.

GHANA

17.1 SCIENTIFIC INFORMATION AND DOCUMENTATION UNIT

Council for Scientific and Industrial Research
P.O. Box M.32
Accra
Ghana

Telephone: 77651
Cable address: SCIENCES

System status: Developmental stage, initiated in 1964
Person responsible: MR. D. K. OPARE-SEM, Head
Institutional affiliations:
Central Reference and Research Library (CRRL)

Council for Scientific and Industrial Research (CSIR)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, electronics, earth and space sciences, chemistry, biology, medical sciences, agricultural sciences, demography, and economics research
Institutional coverage: National government agencies, other national organizations, universities, private institutions
Source of input: Individual scientists, supporting organizations

FILE DESCRIPTION:

Frequency of updating: Biennial
Language of records: English
Data elements included: Project title, project objectives, progress reports, principal investigator, coinvestigators, performing organization name, research program of which project is a part, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, priority status, significant result, cooperating agencies, pilot study

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file (planned), SDI service (planned)
Publications: CSIR is conducting a survey to obtain input for a planned directory of research projects active in Ghana. The directory is scheduled for publication in 1977. One prior publication, *Medical Research Centres in Ghana: Current Research Projects (1973)* (Accra: Council for Scientific and Industrial Research, 1973), included ongoing research project information.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, universities, and other members of the scientific community in Ghana
User fees: None
Descriptive material: Information describing the activities of the Scientific and Technical Information Unit in English is available on request.

ADDITIONAL COMMENTS

The Council for Scientific and Industrial Research has nine institutes, each having its own library housing a specialized collection for that institute. The Central Reference and Research Library was established in 1964 to coordinate the activities of these libraries, and to provide basic collections and information services to support overall CSIR activities.

The CRRL plans to develop a National Science Library, as well as the Scientific and Technical Documentation Unit. At present, CRRL is coordinating publication of a number of serials, in addition to planning the directory of ongoing research information described above. The serials include *Ghana Science Abstracts, CSIR Annual Reports, Union List of Scientific Serials in Ghana Libraries,* and a *Directory of Special and Research Libraries in Ghana.* Other planned publications include directories of research institutes, information facilities, special depositories, data centers, and computer centers, as well as a register of scientific manpower in Ghana.

HUNGARY

18.1 HUNGARIAN CENTRAL TECHNICAL LIBRARY AND DOCUMENTATION CENTRE *ORSZAGOS MUSZAKI KONYVTAR ES DOKUMENTACIOS KOZPONT (OMKDK)*

Reviczky u. 6.
P.O. Box 12
1428 Budapest
Hungary

Telephone: 336–309
Telex: OMKDK H 22–4944

System status: Operational system initiated in 1968
Person responsible: DR. PETER LAZAR, General Director
Institutional affiliation:
State Committee for Technical Development
Orszagos Muszaki Fejlesztesi Bizottsag (OMFB)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, other national organizations
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 3,000
New: 100% *Updated:* 0%
Number of records in active working file: 5,000
Frequency of updating: Project records are not normally updated.
Language of records: Hungarian
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, project type (basic, applied, or developmental)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary (available for use by others)—UDC classifications are also assigned to project records.
Source of subject indexing: Author/investigator, indexing staff with and without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and punched cards (optical coincidence cards and equipment)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations
Access limitations: Restricted to certain user groups
User fees: Yes

ADDITIONAL COMMENTS

OMKDK registers and distributes information on terminated research projects and research reports in addition to ongoing research information. A *Directory of Hungarian Research Institutions* was published in 1975 (U.S. $19.00 by surface mail, $21.00 by air mail).

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INDIA

19.1 NATIONAL AGRICULTURAL RESEARCH INFORMATION SYSTEM (NARIS)

Agricultural Research Information Centre
Indian Council of Agricultural Research
IARS Buildings, Library Avenue
New Delhi-110012
India

Telephone: 587121
Cable address: AGRIRESTA

System status: Operational system initiated in 1967
Person responsible: MR. P. C. BOSE, Information Systems Officer
Institutional affiliations:

Agricultural Research Information Centre (ARIC)

Indian Council of Agricultural Research (ICAR)

Government of India (principal funding organization)

Current Agricultural Research Information System (CARIS)

Food and Agriculture Organization of the United Nations (FAO)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Agricultural sciences research
Institutional coverage: National government agencies
Source of input: Performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 1,360
New: 20% *Updated:* 80%
Number of records in active working file: 7,318
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, man-months of effort required, facilities required, practical utility of project

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical and nonhierarchical vocabularies—The CARIS and AGRIS subject indexing categories are used with slight modifications.

Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files, punched cards, and a computerized system with a Burroughs B4700 central processing unit and magnetic tape processing and storage capabilities

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base

Publications: ARIC annually publishes indexes of ongoing research projects and of terminated research projects that contain several of the data elements listed above. These are provided free of charge.

ARIC has also published the following titles containing ongoing research information:

List of Current Ad-hoc Research Schemes;
List of All India Coordinated Research Projects;
Lists of Ongoing Research Projects other than ICAR Projects (by discipline);
List of Research Projects at ICAR Institutes.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations

User fees: None

ADDITIONAL COMMENTS

The NARIS system also contains information relating to 250 research institutes and stations in the country, as well as data on about 5,000 Indian research workers in the field of agriculture. This information may be obtained from the system; it is also published in directories from time to time.

ARIC acts as the national liaison office for the CARIS ongoing research information system and the bibliographic International Information System for Agricultural Sciences and Technology (AGRIS) of FAO. It forwards input to and receives output from these files.

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19.2 ONGOING RESEARCH INFORMATION SYSTEM PROJECT

Indian National Scientific Documentation Centre
Hillside Road
New Delhi-110012
India

Telephone: 586301, 568384, or 568385
Telex: ND 2499
Cable address: INSDOC NEW DELHI

System status: Operational system initiated in 1972
Persons responsible: MR. T. S. RAJAGOPALAN, Scientist-in-Charge
MR. O. N. CHADDHA, Scientist and Project Leader
MR. A. KRISHNAN, Scientist
Institutional affiliations:
Indian National Scientific Documentation Centre (INSDOC) (principal funding organization)

Council of Scientific and Industrial Research (CSIR)

University Grants Commission (UGC)

Ministry of Education

Department of Science and Technology (DST)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, transport, computer sciences, electronics, materials technology, earth and space sciences, astronomy and astrophysics, chemistry, biology, medical sciences, agricultural sciences, anthropology, demography, architecture, management, and other interdisciplinary science and technology research
Institutional coverage: National government agencies, other national organizations, universities and research institutes
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records in active working file: 12,000
Frequency of updating: Every three to four years
Language of records: English
Data elements included: Project title, project objectives, principal investigator, coinvestigators, performing organization name, project start date and end date, supporting organization name, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text—Other scientific terms are also included in the vocabulary, which is available for use by others.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files, punched cards, and a computerized system operating in batch mode with an IBM 360 Model 44 central processing unit, IBM 024 and 029 card punches, an IBM 056 card verifier, and magnetic tape processing and storage—Information is received in questionnaire format, and is then edited and transferred to machine-readable form. Indexes for directories are computer generated, and text processing is completely automated.
System software: Custom software (CRP) has been developed using PL/1 (F level) language, and is available under certain conditions for use by others.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base, magnetic tapes
Publications: Compilations of ongoing research in Indian laboratories were published by CSIR in 1972 and 1976 and a *Directory of Scientific Research in Indian Universities* in 1974. The most recent inventory, *Current Research Projects in CSIR Laboratories – 1976*, contains information on 2,141 research projects being carried out by 3,861 investigators in 38 laboratories. It covers data collected up to November 1975, and includes keyword, investigator, institution, and sponsor indexes.

The *Directory of Scientific Research in Indian Universities – 1974* was compiled from a survey conducted between June and December 1973. It contains descriptions of 9,908 projects carried out by 11,000 scientists working in 1,000 departments of various academic institutions. It includes investigator, keyword, institution, and sponsor indexes as well.

Both directories are distributed without charge.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
User fees: None

INDONESIA

20.1 BUREAU OF COORDINATION AND SCIENCE POLICY
BIRO KOORDINASI DAN KEBIJAKSANAAN ILMIAH (BKKI)

Lembaga Ilmu Pengetahuan Indonesia
Jalan Teuku Tjhik Ditiro No. 43
P.O. Box 250
Jakarta
Indonesia

Telephone: 47587, 351658, or 351659
Cable address: LIPI

System status: Developmental stage, initiated in 1976
Person responsible: MRS. A. S. LUHULIMA, Head
Institutional affiliations:
Indonesian Institute of Sciences
Lembaga Ilmu Pengetahuan Indonesia (LIPI)

Indonesian Government (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: Unknown at present
New: 100% *Updated:* 0%
Number of records in active working file: 895
Frequency of updating: Annual (planned)
Language of records: Indonesian
Data elements included: Project title, general project summary, project objectives, principal investigator, performing organization name, project start date and end date, project funding, subject descriptors or keywords, main activity of performing organization (research, experimental development, scientific documentation and information, and so on)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary—Subject indexing is based on the *Proposed International Standard Nomenclature for Fields of Science and Technology* from Unesco (Unesco/NS/ROU/257, rev. 1, Paris, December 1973).
Source of subject indexing: Author/investigator

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and a computerized system operating in batch mode with an IBM 370/145 central processing unit and magnetic tape processing and storage capabilities
System software: Custom software

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Planned services will include searches of the current file, SDI service, and statistical analyses of the data base.

Publications: BKKI at present refers inquiries to investigators and performing organizations for data about progress reports, preprints, and other information about individual research projects.

Annual publications containing ongoing research information are planned.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
User fees: None at present

IRAN

21.1 ANNUAL DIRECTORY OF RESEARCH PROJECTS

Bureau of Studies and Coordination
Ministry of Science and Higher Education
Villa Avenue, Building No. 2
Tehran
Iran

Telephone: 896282 or 838021

System status: Operational system initiated in 1976
Person responsible: DR. ALI A. BEIHAGHI, Director General
Institutional affiliations:
Bureau of Studies and Coordination

Ministry of Science and Higher Education

National Scientific Research Council (principal funding organization)
Shoray Pazhoheshhay Elmy Keshvar

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 1,500–2,000
New: 50% *Updated:* 50%
Number of records in active working file: 2,000
Frequency of updating: Annual
Language of records: Farsi
Data elements included: Project title, general project summary, project objectives, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)—Subject indexing is based on a coded list of fields of scientific research developed by authors.
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files—Use of punched cards and magnetic tapes is under consideration.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base
Publications: The *Annual Directory of Research Projects* was first published in 1976. The directory, written in Farsi, contains ongoing research information and is divided into five sections: engineering, agriculture, medical sciences, basic sciences, and social sciences and humanities. It is distributed free of charge. Preparation of the 1977 edition is in process.

AVAILABILITY:

Types of organizations served: National government agencies, universities, individual scientists
User fees: None
Descriptive material: A descriptive brochure in Farsi is available on request.

21.2 BUREAU FOR COORDINATION AND CENTRALIZATION OF AGRICULTURAL RESEARCH
DAFTAR-E TAMARKOZ VA HAMAHANGI TAHGHIGHAT-E KESHAVARZI

Agricultural Research Organization
Ministry of Agriculture and Natural Resources
Tehran
Iran

Telephone: 6122688
Telex: 215384

System status: Developmental stage, initiated in 1976
Person responsible: DR. MOHAMMAD REZANIA, Director-General
Institutional affiliations:
Agricultural Research Organization
Sazman-e Tahghighat-e Keshavarzi

Ministry of Agriculture and Natural Resources (principal funding organization)
Vezarat-e Keshavarzi va Manabe-e Tabii

Current Agricultural Research Information System (CARIS)

Food and Agriculture Organization of the United Nations (FAO)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Biological and agricultural sciences research
Institutional coverage: National government agencies, other national organizations, research institutes, development organizations, private companies, universities
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records in active working file: 695
Frequency of updating: Quarterly
Language of records: Farsi and English
Data elements included: Project title, principal investigator, performing organization name, performing organization address, research program of which project is a part—Starting in 1978, general project summary, project objectives, project methodology or approach, progress reports, coinvestigators, project start date and end date, subject descriptors or keywords, and bibiiographic references will also be recorded.

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: The bureau does not subject index project records.
Source of subject indexing: CARIS Coordinating Centre

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service
Publications: A circular newsletter containing ongoing research information is planned.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
Access limitations: Restricted to certain user groups
User fees: None

ADDITIONAL COMMENTS

The Bureau for Coordination and Centralization of Agricultural Research participates in the CARIS worldwide system in Rome. To date, the bureau has distributed CARIS questionnaires within the Ministry of Agriculture and Natural Resources, received the completed forms, and will forward them to the CARIS Coordinating Centre in Rome for input into that data base. The bureau will distribute CARIS forms to organizations outside the ministry that are engaged in agricultural research at a later stage.

21.3 IRANIAN DOCUMENTATION CENTRE (IRANDOC)
MARKAZ-E MADAREK-E ELMI

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46 Shahreza Avenue
P.O. Box 11–1387
Tehran
Iran

Telephone: 662548 or 662254
Telex: 212889 IRDC
Cable address: ASNADIRAN

System status: Operatonal system initiated in 1968
Person responsible: MR. ALI SINAI
Institutional affiliations:

Institute for Research and Planning in Science and Education (IRPSE)
Moasse-ye Tahqiqat va Barnamerizi-ye Elmi va Amuzeshi

Ministry of Science and Higher Education
Vezarat-e Olum va Amuzesh-e Ali

Iranian Government (principal funding organization)
Dowlat-e Iran

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National—Some international coverage is available through exchange agreements and memberships in international federations and associations.
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, other national organizations
Source of input: Performing organizations, supporting organizations

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FILE DESCRIPTION:

Number of records processed annually: 20
New: 15% *Updated:* 85%
Number of records in active working file: 20
Language of records: Farsi, English, and French
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available under certain conditions for use by others)
Source of subject indexing: Indexing staff with and without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Punched cards (Selecto punching machine and lightbox)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file are conducted in all fields covered. Planning and coordination activities are carried out in the fields of library and information science and educational planning.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
User fees: None
Descriptive material: A descriptive brochure in Farsi is available on request.

ADDITIONAL COMMENTS

IRANDOC has published directories of national scientific and technical institutions (1972) and of specialists in chemistry and allied industries (1974) in Iran.

IRANDOC participates in document and information exchange programs with members of some international federations and associations.

21.4 TECHNICAL DOCUMENTATION CENTRE

Plan and Budget Organization
Building No. 12
Ferdosi Avenue and Kushk Street
Tehran
Iran

Telephone: 301130
Telex: 2642
Cable address: TEHRAN BARNAMEH

System status: Developmental stage, initiated in 1971
Person responsible: MR. A. KHORASANI, Head
Institutional affiliations:
Plan and Budget Organization

Prime Ministry

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Engineering, agricultural sciences, and social sciences including demography, economics, education, and sociology research
Institutional coverage: National government agencies, other national organizations
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 200
Number of records in active working file: 200
Language of records: Persian
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available under certain conditions for use by others)
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files, microfilm, and microfiche—Records are processed and retrieved using microfilm and microfiche reader/printers.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations
Access limitations: Restricted to certain user groups
User fees: None
Descriptive material: Descriptive material in Persian is available on request.

ISRAEL

22.1 CURRENT R & D IN ISRAEL

COSTI
84, Hachashmonaim Street
P.O. Box 20125
Tel-Aviv 61200
Israel

Telephone: 03–28 81 11
Telex: 03–2332
Cable address: COSTI Tel-Aviv

System status: Operational system initiated in 1968
Person responsible: MR. P. WOLLMAN, Head, Systems Development Department
Institutional affiliations:
National Center of Scientific and Technological Information (COSTI)

National Council for R & D

Office of the Prime Minister

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, computer sciences, electronics, materials technology, earth and space sciences, astronomy and astrophysics, chemistry, biology, medical sciences, agricultural sciences, anthropology, demography, and psychology research
Institutional coverage: National government agencies, other national organizations, universities, industry
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 10,000
New: 30% *Updated:* 70%
Number of records in active working file: 10,000
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available for use by others) and the International Standard Nomenclature System developed by Unesco, expanded version—Subject indexing is based on titles that are elaborated with additional information taken from the text. Keywords are extracted by machine and then edited with a special dialogue system. Subject indexes are used in addition to the keyword indexing, and keyword indexing is designed to cover concepts as well as the meaning of individual words.
Source of subject indexing: Indexing staff with scientific background, computer

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode using an IBM 370/168 central processing unit with disk storage
System software: Custom software packages (available for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Address labels
Publications: The National Center of Scientific and Technological Information (COSTI) regularly compiles the directory for which the latest edition is: *Current R & D Projects in Israel, 1975, Natural Sciences and Technology,* two volumes, Fourth Edition, U.S. $65.00 (includes mailing).

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations
User fees: Yes
Descriptive material: Descriptive material is available in English on request.

ADDITIONAL COMMENTS

Efforts are underway to integrate this ongoing research information file with a data base on research funds administration and a data bank on thesis work.

ITALY

23.1 NATIONAL RESEARCH COUNCIL
CONSIGLIO NAZIONALE DELLE RICERCHE (CNR)

Piazzale delle Scienze 7
00100 Rome
Italy

Telephone: 4993
Telex: 61076 CoRicere
Cable address: RoRicerche-Roma

System status: Operational system initiated in 1969

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National (CNR-sponsored research only)
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, other national organizations
Source of input: Supporting organization (CNR only)

FILE DESCRIPTION:

Number of records processed annually: 3,447 (1973)
Language of records: Italian
Data elements included: Project title, general project summary, project objectives, progress reports, principal investigator, coinvestigators, performing organization name, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode with an IBM 370/145 central processing unit and disk processing and storage capabilities
System software: Custom software packages

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: On-line access (planned)
Publications: CNR has produced the following publications that contain ongoing research information:
Ricerche promosse dal C.N.R. Anno 1967: Volume I, Indice sistematico; Volume II, Indice per argomenti (Rome, 1969);
Ricerche promosse dal C.N.R. Anno 1968: Volume I, Indice sistematico; Volume II, Indice per argomenti (Rome, 1971);
Ricerche finanziate dal C.N.R. Anno 1972: Volume I e Volume II (Rome, 1975); and
Ricerche finanziate dal C.N.R. Anno 1973: Volume I e Volume II (Rome, 1976).

AVAILABILITY:

Types of organizations served: National government agencies (at present CNR only)
Access limitations: Restricted to certain user groups
User fees: None

ADDITIONAL COMMENTS

At present the ongoing research information system operated by CNR can be used only internally. Plans are underway to study the possiblity of providing public access to the data base on-line through CNUCE and other university networks, except for confidential financial information.

JAPAN

24.1 JICST CLEARING SYSTEM
JICST KURIARINGU SHISUTEMU

5–2 Nagata-cho 2-chome, Chiyoda-ku
C.P.O. Box 1478
Tokyo 100–91
Japan

Telephone: (03) 581–6411
Cable address: JICSTECH TOKYO

System status: Operational system initiated in 1977
Person responsible: DR. TAKEYOSI HANADA, Senior Information Officer, Information Resources Division
Institutional affiliations:
Japan Information Center of Science and Technology (JICST)
Nippon Kagaku Gijutsu Joho Senta

Japan Science and Technology Agency (principal funding organization)
Kagaku Gijutsu-cho

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Physics, engineering, electronics, materials technology, earth sciences, chemistry, and medical sciences research—Coverage in biology and agricultural sciences will be added during 1978.
Institutional coverage: National government agencies, other national organizations, universities and colleges (partial coverage)
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records in active working file: 11,000 (from 365 research organizations)
Frequency of updating: Annual
Language of records: Japanese
Data elements included: Project title, general project summary, principal investigator, performing organization name, performing organization address, project start date and end date, subject descriptors or keywords, performing organization telephone number, planned research projects

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text—UDC subject classifications are used.
Source of subject indexing: Outside indexer with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system with a HITAC 8450 central processing unit, disk storage and processing capabilities, and a Kanji teletypewriter (Chinese characters)
System software: Japan On-line Information System (JOIS) software package

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: On-line access
Publications: Ongoing research information is published biennially in Japanese in *JICST Clearing Service: Guide to the Public Laboratories and Research Organizations in Japan.* The 1974 edition of 1,214 pages listed 401 research organizations (9,000 yen), and the 1975 edition of 624 pages 270 research organizations and 10,065 research subject themes (8,000 yen).

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations
User fees: Yes

ADDITIONAL COMMENTS

The Japan Information Center of Science and Technology, established in 1958, has as its function the publication of the *Current Bibliography on Science and Technology,* an abstract journal for domestic and foreign scientific and technical literature; reproduction and translation of technical documents on request; and provision of literature and patent searches on request. The JICST Clearing System for information on research in progress has been recently added to the system.

24.2 RETRIEVAL SYSTEM FOR CURRENT RESEARCH IN THE AGRICULTURAL SCIENCES (RECRAS)

NORIN SUISAN SHIKEN KENKYU KADAI KIKAI KENSAKU SHISUTEMU

1–2–1 Kasumigaseki, Chiyoda-ku
Tokyo 100
Japan

Telephone: (03) 502–8111
Cable address: MINAFRESEARCH TOKYO

System status: Developmental stage, initiated in 1972
Person responsible: MR. MIKIO OTSUKA, Director, Investigation and Information Division
Institutional affiliations:

Agriculture, Forestry and Fisheries Research Council Secretariat
Norin Suisan Gijutsu Kaigi Jimukyoku

Ministry of Agriculture and Forestry
Norinsho

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Agricultural sciences research
Institutional coverage: National government agencies
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 12,000
New: 55% *Updated:* 45%
Number of records in active working file: 40,000
Frequency of updating: Annual
Language of records: Japanese
Data elements included: Project title, general project summary, performing organization name, project start date and end date, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Classification of Agricultural Science and Technology (CAST), a fixed hierarchical vocabulary—CAST is a multiaspect postcoordination classification scheme especially designed for RECRAS.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode and on-line with a HITAC 8400 central processing unit and disk processing and storage capabilities, and microfilm
System software: Custom software packages

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, on-line access
Publications: The Agriculture, Forestry and Fisheries Research Council publishes the *Annual Report on Experiments in Agriculture, Forestry and Fisheries* that contains ongoing research information, as well as a series of lists of research projects in agriculture, forestry, and fisheries at national and municipal organizations.

AVAILABILITY:

Types of organizations served: National government agencies
Descriptive material: Descriptive material in Japanese and English is available on request.

24.3 RETRIEVAL SYSTEM FOR GENERAL INFORMATION ON SCIENTIFIC AND TECHNOLOGICAL RESEARCH (REGISTER)
KAGAKU GIJUTSU KENKYU JOHO KENSAKU SHISUTEMU

2-1 Kitnaomaru-Koen, Chiyoda-ku
Tokyo 102
Japan

Telephone: (03) 212-8471

System status: Operational system initiated in 1971
Person responsible: MR. TUNEO YOSIMURA, Director, Division of System Development
Institutional affiliation:
Japan Science Foundation (JSF)
Zaidan Hojin Nihon Kagaku Gijutsu Shinko Zaidan

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, computer sciences, electronics, materials technology, earth and space sciences, astronomy and astrophysics, chemistry, biology, medical sciences, and agricultural sciences research

Institutional coverage: National government agencies, other national organizations, nonprofit organizations, universities, municipal government organizations, museums
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 13,000
New: 100% *Updated:* 0%
Number of records in active working file: 50,000
Frequency of updating: Annual
Language of records: Japanese
Data elements included: Project title, principal investigator, performing organization name, performing organization address

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Classification of Science and Technology (CST), a fixed hierarchical vocabulary (available under certain conditions for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode with a HITAC 8400 central processing unit and disk storage and processing capabilities, and microfilm
System software: Custom software packages (available for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, and any other interested organization
User fees: Yes
Descriptive material: Descriptive material in Japanese and English is available on request.

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KENYA

See Entry 2.14 under Regional Services.

KOREA, REPUBLIC OF

25.1 KOREAN SCIENTIFIC AND TECHNOLOGICAL INFORMATION CENTER (KORSTIC) *HAN KOOK KWA HAK KI SOOL JONG BO CENTER*

206–9, Chongryangri-dong
131 Dongdaemoon-ku
C.P.O. Box 1229
Seoul
Republic of Korea

Telephone: (96) 5051–5054
Cable address: KORSTIC

System status: Operational system
Person responsible: MR. DOO-HONG KIM, Director General
Institutional affiliation:
Ministry of Science and Technology
Kwa Hak Ki Sool Chu

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, computer sciences, electronics, materials technology, earth and space sciences, astronomy and astrophysics, chemistry, biology, and agricultural sciences research
Institutional coverage: National government agencies, other national organizations
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 2,152
New: 100% *Updated:* 0%
Number of records in active working file: 2,152
Frequency of updating: Annual
Language of records: Korean
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, project funding, subject descriptors or keywords, bibiliographic references, collecting method for reference data, principal investigator's rank and major field of study

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: The Korean Scientific and Technological Information Center publishes annually the *Directory of On-going Researches in Korea – Science and Technology*, the latest edition of which is December 1976. The directories are free of charge.

AVAILABILITY:

Types of organizations served: National government agencies
User fees: None
Descriptive material: Descriptive material in Korean is available on request.

KUWAIT

26.1 RESEARCH AND DEVELOPMENT INFORMATION SYSTEM (R & D IS)

National Scientific and Technical Information Center
Kuwait Institute for Scientific Research
P.O. Box 12009
Kuwait
Kuwait

Telephone: 816988
Telex: KISR-KT 2299
Cable address: SCIENCE KUWAIT

System status: Developmental stage
Person responsible: DR. MOHAMED H. ZEHERY, Director
Institutional affiliations:
National Scientific and Technical Information Center

Kuwait Institute for Scientific Research (KISR)
Ma'Had al-Kuwait Lil-Abhath al-Ilmiyah

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National (regional coverage of the Persian Gulf area is planned)
Subject coverage: Physics, engineering, computer sciences, earth and space sciences, chemistry, biology, medical sciences, agricultural sciences, demography, economics, education, and sociology research
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations, business and industry
Source of input: Performing organizations

FILE DESCRIPTION:

Language of records: English
Data elements included: Project title, general project summary, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available under certain conditions for use by others)
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode with an IBM 370/158 central processing unit, 3780 data communication terminal, and magnetic tape storage processing capabilities—Punched cards are used initially, and serve as a backup to the computerized system.
System software: Custom software at present (available under certain conditions for use by others)—Use of the OS version of the ISIS package in batch mode is planned for mid-1977. Later on-line access is also planned.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, and statistical analyses of the data base are planned.
Publications: A periodic research directory is also planned for publication.

AVAILABILITY:

Types of organizations served: National government agencies, international organizations
Access limitations: Restricted to certain user groups
User fees: None

ADDITIONAL COMMENTS

The Research and Development Information System presently maintains a file of the scientific and technical periodicals available in all major libraries in Kuwait. This file is being expanded to cover the entire Persian Gulf region. Plans are being developed to provide researchers in the country with SDI service and/or listings of journals pertaining to their field of interest.

A survey of ongoing research projects has only recently been initiated, and the results have not yet been received. These results will form the foundation for the ongoing research information data base.

LEBANON

27.1 SCIENTIFIC DOCUMENTATION AND INFORMATION CENTRE
CENTRE DE DOCUMENTATION ET D'INFORMATION SCIENTIFIQUE

P.O. Box 11.8281
Beirut
Lebanon

Telephone: 302287
Cable address: CENERES

System status: Developmental stage, initiated in 1974
Person responsible: Director (post is temporarily vacant)
Institutional affiliation:
National Council for Scientific Research
Conseil nationale de la recherche scientifique (CNRS)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, other national organizations, foreign organizations
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 250 (for the first year)
Number of records in active working file: 250
Frequency of updating: Annual
Language of records: English, French
Data elements included: Project title, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, project start date and end date, supporting organization name, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Free indexing terms provided by the investigators
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files—Data processing by computer is planned.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: The publication of a directory containing ongoing research information has been temporarily suspended. The *Annual Report* of CNRS contains information about the approximately 100 projects it sponsors.

AVAILABILITY:

Types of organizations served: National government agencies, individual scientists
User fees: None

ADDITIONAL COMMENTS

The activities of the Scientific Documentation and Information Centre have been temporarily slowed by the war in Lebanon, but will resume as soon as the situation returns to normal.

LUXEMBOURG

See Entries 2.11 and 2.12 under Regional Services.

MALAWI

28.1 NATIONAL REGISTER OF RESEARCH PROJECTS AND WORKERS

National Research Council Secretariat
Office of the President and Cabinet
Private Bag 301
Capital City
Lilongwe 3
Malawi

Telephone: Lilongwe 31199
Cable address: PRESMIN, Lilongwe

System status: Operational system initated in 1975
Persons responsible: Secretary, National Research Council
Secretary to the President and Cabinet
Institutional affiliations:
National Research Council

Office of the President and Cabinet

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, earth sciences, chemistry, biology, medical sciences, agricultural sciences, anthropology, economics, education, psychology, sociology, archaeology, history, law, and languages research
Institutional coverage: National government agencies, other national organizations, independent organizations
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records in active working file: 231 (1975)
Language of records: English
Data elements included: Project title, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, contract, grant, or project number assigned, subject descriptors or keywords, supporting technicians, coordinating center, magnitude (major or minor project)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary
Source of subject indexing: Author/investigator, indexing staff

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services for ongoing research information are provided beyond production of the publication listed below.

Publications: The National Research Council Secretariat first compiled the *National Register of Research Projects and Workers* (Zomba: Government Printer, 1975) in 1975 to describe, as far as possible, all projects being conducted by government departments or institutions, statutory bodies, and independent bodies during that year. It is distributed free of charge on an exchange basis.

AVAILABILITY:

Types of organizations served: National government agencies, research organizations (domestic and foreign)
User fees: None

ADDITIONAL COMMENTS

The National Research Council Secretariat also compiled a *National Register of Research Publications 1965–1975* that included citations for publications produced during that period by research workers in government research departments, the former Agricultural Research Council of Malawi, the Tea Research Foundation of Central Africa, and the University of Malawi.

The National Research Council also plans and advises current research programs in the country.

MALAYSIA

29.1 TECHNICAL INFORMATION SERVICE

Standards and Industrial Research Institute
of Malaysia
P.O. Box 35
Sungei Renggam
Shah Alam, Selangor
Malaysia

Telephone: 361333/6/7
Cable address: SIREMSEC Sungei Renggam

System status: Developmental stage, initiated in 1977
Person responsible: MR. VINCENT CHOONG, Librarian
Institutional affiliations:
Standards and Industrial Research Institute of Malaysia (SIRIM)

Government of Malaysia (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, engineering, electronics, materials technology, earth and space sciences, chemistry, biology, medical sciences, and agricultural sciences research
Institutional coverage: National government agencies, other national organizations, private firms—The service covers all institutions engaged in research and teaching in Malaysia.
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Language of records: English
Data elements included: Project title, general project summary, performing organization name, performing organization address, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

Publications: The Technical Information Service is preparing a directory of ongoing research project information which will be produced annually.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations

User fees: None

Descriptive material: Descriptive material in English is in preparation.

MEXICO

30.1 SCIENTIFIC AND TECHNOLOGICAL RESOURCES RESEARCH CENTER *CENTRO DE INVESTIGACION DE RECURSOS CIENTIFICOS Y TECNOLOGICOS (CIRCYT)*

Direccion de Informacion
Consejo Nacional de Ciencia y Tecnologia
Barranca del Muerto No. 210, 3er. Piso
Mexico 20, D.F.
Mexico

Telephone: 524–73–88

System status: Operational system initiated in 1974—Portions of the system are still under development.
Person responsible: MR. JOSE JAVIER PARRA MORENO, Jefe
Institutional affiliations:
Information Center
Direccion de Informacion

National Council for Science and Technology
Consejo Nacional de Ciencia y Tecnologia (CONACYT)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific and technological research
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 9,287 (in 1974)
Number of records in active working file: 9,287 (in 1974)
Frequency of updating: The first update was completed in 1977. Thereafter updates will be made continuously.
Language of records: Spanish
Data elements included: Project title, project objectives, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords, associated degree if any, project type (basic, applied, experimental development), origin of project, project stage, number and type of personnel, other participating organization names, confidentiality

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical and nonhierarchical vocabularies (available for use by others)
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating on-line and in batch mode with a DCD 6400 central processing unit and magnetic tape and disk processing and storage capabilities—A system employing a UNIVAC 90/30 is under development.
System software: QUERY UPDATE (available under certain conditions for use by others)—SYSTEM 2000 will be used in the system now under development.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base, on-line access
Publications: The results of statistical analyses of the ongoing research information collected by CONAYCT appeared in the publication, *Estadisticas Basicas sobre el Sistema Cientifico y Technologico Nacional (Periodo de Captacion 1973–1974): Las Instituciones que Realizan Investigacion y Desarollo Experimental.* Published in 1977, this title is No. 4 in the series of directories and catalogs produced by CONAYCT.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations
Access limitations: Restricted to certain user groups
User fees: None

NETHERLANDS

31.1 CENTRAL PROJECT ADMINISTRATION
CENTRALE PROJECTEN ADMINISTRATIE (CPA)

National Council for Agricultural Research
Postbus 297
2076 The Hague
Netherlands

Telephone: 070–84 83 00

System status: Operational system initiated in 1970
Person responsible: MR. G. WANSINK, Secretary
Institutional affiliations:

National Council for Agricultural Research TNO
Nationale Raad voor Landbouwkundig Onderzoek TNO (NRLO-TNO)

Permanent Inventory of Agricultural Research Projects (AGREP)

Commission of the European Communities (CEC)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Agricultural sciences research
Institutional coverage: National government agencies, other national organizations
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 3,500
New: 15% *Updated:* 85%
Number of records in active working file: 3,500
Frequency of updating: Annual
Language of records: Dutch, plus English translations of project titles
Data elements included: Project title, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, expected results, collaborating organizations

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)—The AGREP *Classification Scheme of Agricultural and Forestry Research* is used.
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy--This input is converted into punched cards with the use of an encoder/viewer.
Processing and storage methods: Manual files, punched cards

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base
Publications: The Central Project Administration, National Council for Agricultural Research TNO is responsible for the following publication containing ongoing research information:

Index on Agricultural Research Projects 1974, in Dutch only (National Council for Agricultural Research, November 1974).

Statistical analyses of the data base are incorporated into research reports produced by NRLO-TNO.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations
Access limitations: Restricted to certain user groups
User fees: None
Descriptive material: Descriptive material in Dutch is available on request.

ADDITIONAL COMMENTS

NRLO-TNO acts as the national focal point for the Netherlands in AGREP.

31.2 COORDINATION GROUP FOR ONGOING RESEARCH INFORMATION SYSTEMS
COORDINATIEGROEP INFORMATIESYSTEMEN LOPEND ONDERZOEK (CILO)

Directorate-General for Science Policy
Ministry of Education and Science
Nieuwe Uitleg 1
The Hague
Netherlands

Telephone: 070–46 97 60

System status: Operational system initiated in 1976
Person responsible: MR. J. W. R. ARNOLD, Secretary
Institutional affiliations:
Directorate-General for Science Policy

Ministry of Education and Science
Ministerie van Onderwijs en Wetenschappen (Min. O & W)

ADDITIONAL COMMENTS

CILO functions not as an ongoing research project information system itself, but rather as an advisory committee that coordinates diverse current activities in the field in the Netherlands, with the object of presenting systematically and accurately information about ongoing research financed or partly financed by the government. CILO will also be active in adapting national activities to international developments in the field.

The following organizations are represented in CILO (those marked with a star are currently active in collecting ongoing research information):

Academic Council (Academische Raad);

Ministry of Education and Science (Ministerie van Onderwijs en Wetenschappen, Min. O & W);

Interministerial Committee on Science Policy (Interdepartementaal Overleg voor het Wetenschapsbeleid, IOW);

Netherlands Organization for Information Policy (Stichting Nederlands Orgaan voor de bevordering van Informatieverzorging, NOBIN);

*Social Science Information and Documentation Centre (Sociaal-Wetenschappelijk Informatie- en Documentatiecentrum, SWIDOC), Royal Netherlands Academy of Arts and Sciences (Koninklijke Nederlandse Akademie van Wetenschappen, KNAW);

*Netherlands Organization for the Advancement of Pure Research (Nederlandse Organisatie voor Zuiver Wetenschappelijk Onderzoek, ZWO);

*National Council for Agricultural Research TNO (Nationale Raad voor Landbouwkundig Onderzoek TNO, NRLO-TNO); and the

*Netherlands Organization for Applied Scientific Research (Nederlandse Organisatie voor Toegepast Natuurwetenschappelijk Onderzoek, TNO).

31.3 CURRENT RESEARCH IN THE NETHERLANDS (CRN)

Netherlands Organization for the Advancement
of Pure Research
Juliana van Stolberglaan 148
Postbus 93138
2509 AC The Hague
Netherlands

Telephone: 070–83 91 00
Telex: 31660 nogv
Cable address: ZWO The Hague

System status: Operational system initiated in 1964
Person responsible: DRS. S. T. GROENMAN, Head
Institutional affiliation:
Netherlands Organization for the Advancement of Pure Research
Nederlandse Organisatie voor Zuiver Wetenschappelijk Onderzoek (ZWO)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, computer sciences, earth and space sciences, astronomy and astrophysics, biological sciences, medical sciences, fundamental agricultural sciences, and humanities (philosophy, theology, history, art history, archaeology, linguistics, literature) research—Information about research in engineering and chemistry will be added later.
Institutional coverage: Universities, national government agencies, other national organizations
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 3,000
New: 60% *Updated:* 40%
Number of records in active working file: 7,500
Frequency of updating: One division of the file is updated each year.
Language of records: English
Data elements included: Project title, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, broad fields of research
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Computerized system operating on-line with a CD Cyber 72 central processing unit (128K bytes of storage), disk storage and processing, and a Comm-Stor Sykes terminal for data entry

System software: Project Inventory Eusidic Type (PINEUT) written in Fortran IV especially for ZWO (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

Publications: ZWO publishes all the ongoing research information it collects in the series *Current Research in the Netherlands.* The volume on *Biological and Medical Sciences 1973* was published in 1975 (D.Fl. 25.-) and is currently under revision; and on *Mathematics, Physics, Geology, Astronomy 1975, With Supplement 1976* in 1976–1977 (D.Fl. 14.-). The volume on *Humanities 1976* was published in 1977 (D.Fl. 20.-).

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations

Access limitations: Restricted to certain user groups

User fees: Fees are charged for the publications listed above; no fees are charged for other retrieval services.

31.4 EDUCATIONAL RESEARCH PROJECT REGISTRATION (ERPR)
PROJEKTREGISTRATIE ONDERWIJSONDERZOEK (PROO)

Stichting voor Onderzoek van het Onderwija
Pletterikkade 50
2515 SH The Hague
Netherlands

Telephone: 070–82 43 21
(international 3170–82 43 21)

System status: Operational system initiated in 1966

Person responsible: DRS. G. B. KOSSE, Head, Programming Information Systems

Institutional affiliations:

Foundation for Educational Research (FER)
Stichting voor Onderzoek van het Onderwijs (SVO)

Department of Education and Science (DES) (principal funding organization)
Ministerie van Onderwijs en Wetenschappen (Min. O & W)

Netherlands

European Documentation and Information System for Education (EUDISED)
Systeme europeen de documentation et d'information pedagogiques

Council of Europe
Conseil de l'Europe

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Education research
Institutional coverage: National government agencies, other national organizations, universities and institutes
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 150
New: 0% *Updated:* 100%
Number of records in active working file: 150
Frequency of updating: Monthly
Language of records: Dutch—Records in English, French, German, and Spanish will be added in the future.
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization names, supporting organization addresses, contract, grant, or project number assigned, subject descriptors or keywords (planned), bibliographic references, man-years, educational level, type of educational problem (planned)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical and nonhierarchical vocabularies (available under certain conditions for use by others)—The EUDISED multilingual thesaurus will be used for subject indexing, in addition to current vocabularies.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files—A computerized system operating on-line with punched cards, magnetic tape, and disk processing and storage capabilities is planned.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base, on-line access (planned)

Publications: Until now ERPR disseminated ongoing research information in an annual published report, *Jaarverslag*, in Dutch; and in a biannual survey, *Educational Research in the Netherlands*, in English. This latter publication was last produced for the period September 1972 – September 1974, and included descriptions for projects in progress and recently terminated, plus indexes for investigators and subjects.

Future dissemination of the information gathered by ERPR will take place through the EUDISED international system and ERPR publications.

Some information is currently available in the EUDISED publication *EUDISED R & D bulletin* which is published four to six times/year.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations (planned), international organizations (planned)

Access limitations: Personal data dissemination is restricted.

User fees: Fees for processing costs only are planned.

Descriptive material: Descriptive material in Dutch is available on request.

ADDITIONAL COMMENTS

Through participation in the EUDISED system, ERPR will also collect and disseminate information about educational audio-visual materials and periodicals, in addition to data about ongoing and recently completed research projects and research proposals. Educational policy in participating countries is also monitored and published in the EUDSIED bimonthly *News-letter/Faits nouveaux*.

31.5 ENVIRONMENTAL RESEARCH IN THE NETHERLANDS
MILIEU-ONDERZOEK IN NEDERLAND

Study and Information Centre TNO on
Environmental Research
Schoemakerstraat 97
Postbus 186
Delft
Netherlands

Telephone: 015-56 93 30
Telex: 31453 zptno nl

System status: Operational system initiated in 1971
Person responsible: DR. L. GINJAAR, Director

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Institutional affiliations:

Study and Information Centre TNO on Environmental Research
Studie- en Informatiecentrum TNO voor het Onderzoek ten dienste van het Milieubeheer (SCMB-TNO)

Netherlands Organization for Applied Scientific Research (principal funding organization)
Nederlandse Organisatie voor Toegepast Natuurwetenschappelijk Onderzoek (TNO)

Commission of the European Communities (CEC)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Environmental research
Institutional coverage: National government agencies, other national organizations, and industry
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records in active, working file: 1,450 (1971 to present)
Frequency of updating: Every two to three years
Language of records: Dutch
Data elements included: General project summary, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, subject descriptors or keywords, availability of reports, cooperating institutes, planning stage

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed vocabulary, keyword strings (vocabulary is available for use by others)
Source of subject indexing: Indexing staff with and without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and computerized system operating on-line with magnetic tape processing and storage capabilities—Equipment used includes a teletype and a Control Data Cyber 72 minicomputer with 64K bytes of storage.
System software: Project Inventory Eusidic Type (PINEUT) written in Fortran IV, and FLIRT (Free Lanugage Information Retrieval Tool)—The software is available under certain conditions for use by others.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, on-line access, magnetic tape (planning stage)
Publications: SCMB-TNO produces reports and publications such as *Milieu-onderzoek in Nederland* (Staatsuitgeverij, 's-Gravenhage, 1975, ISBN 90 12 01031 4, D.Fl. 40.-) that contain ongoing research information. This report is scheduled for revision and reissue in 1977–1978.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations
User fees: None

ADDITIONAL COMMENTS

Environmental Research in the Netherlands is part of the Commission of the European Communities (CEC) UNEP/IRS system.

31.6 REGISTER OF CURRENT SCIENTIFIC RESEARCH IN AND OVER THE FIRST LINE OF HEALTH CARE
REGISTRATIE LOPEND WETENSCHAPPELIJK ONDERZOEK IN EN OVER EN EERSTE LIJN VAN DE GEZONDHEIDSZORG (RWO)

Nederlands Huisartsen Instituut
Mariahoek 4
Utrecht
Netherlands

Telephone: 030–31 99 46

System status: Operational system initiated in 1972
Person responsible: MRS. L. BRESSER-SCHEEPMAKER
Institutional affiliation:
Netherlands Institute of General Practitioners
Nederlands Huisartsen Instituut (NHI)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Medical and social sciences research concerning the first line of health care
Institutional coverage: National government agencies, other national organizations, universities, individual general practitioners
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 130
New: 90% *Updated:* 10%
Number of records in active working file: 230
Frequency of updating: Semiannual
Language of records: Dutch
Data elements included: Project title, general project summary, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, project number assigned, project funding, subject descriptors or keywords, bibliographic references, form of eventual publications

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: NHI produces annually the *Registratie lopend wetenschappelijk onderzoek in en over de eerste lijn van de gezondheidszorg* (1976 edition, nr. 5, D.Fl. 17.50) that contains, along with project descriptions, indexes for subjects, performing organizations, and supporting organizations.

A list of new projects containing project numbers, titles, performing organization names, and investigators, *Mededelingenblad*, is also compiled annually (no charge).

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, general practitioners, students
User fees: Fees are charged for the publication listed above; no fees are charged for other retrieval services.
Descriptive material: Descriptive material in Dutch is available on request.

31.7 SOCIAL SCIENCE INFORMATION AND DOCUMENTATION CENTRE
SOCIAAL-WETENSCHAPPELIJK INFORMATIE- EN DOCUMENTATIECENTRUM (SWIDOC)

Kleine-Gartmanplantsoen 10
Amsterdam-C
Netherlands

Telephone: 020–22 50 61

System status: Operational system initiated in 1963
Person responsible: DR. H. P. HOGEWEG-DE HAART, Director
Institutional affiliations:
Royal Netherlands Academy of Arts and Sciences
Koninklijke Nederlandse Akademie van Wetenschappen (KNA W)

Ministry of Education and Science (principal funding organization)
Ministerie van Onderwijs en Wetenschappen (Min. O & W)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Anthropology, demography, economics, education, political science, psychology, sociology, social and economic geography, and history research
Institutional coverage: National government agencies, other national organizations, regional and local government agencies, universities, research institutes, foundations, private organizations, private industry
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 1,200
New: 50% *Updated:* 50%
Number of records in active working file: 2,000
Frequency of updating: Every eighteen months
Language of records: Dutch
Data elements included: Project title, project objectives, project methodology or approach, progress reports, principal investigator, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, project funding, subject descriptors or keywords, bibliographic references, performing organization telephone number, language in which reports will be published if other than Dutch

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)—Jean Viet's *Thesaurus for Information Processing in Sociology* has been translated into Dutch, and is under consideration for use in the SWIDOC system.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and punched cards

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: SWIDOC produces four regular publications that contain ongoing research information:

Titels van sociaal-wetenschappelijk onderzoek (Titles of Social Sciences Research) (Amsterdam: SWIDOC, monthly, free in the Netherlands, D.Fl. 10.- abroad)—This is a current awareness tool, and contains only partial information about the projects;

Informatie omtrent lopend onderzoek in de sociale wetenschappen (Information on Current Social Science Research) (Amsterdam: North Holland Publishing Company, ISBN 0 7204 8339 5, semiannual, D.Fl. 25.-)—Full project information is included in this publication which also includes a subject index and list of research institutions;

Register van sociaal-wetenschappelijk onderzoek (Register of Social Science Research) (Amsterdam: North Holland Publishing Company, ISBN 0 7204 8320 4, D.Fl. 45.-)—This cumulative publication is produced every one to two years. The last edition is from February 1976; and

Dissertaties maatschappijwetenschappen (Doctoral Dissertations in the Social Sciences) (Amsterdam: North Holland Publishing Company, ISBN 0 7204 8337 9, D.Fl. 15.-)—This publication contains descriptions of doctoral theses in preparation in the field.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, research organizations
User fees: Yes
Descriptive material: Descriptive material in Dutch and English is available on request.

ADDITIONAL COMMENTS

The registration of ongoing research project information is an integral part of SWIDOC's services. While updating project descriptions, SWIDOC requests copies of progress reports and other publications that result from the research, as well as receiving other documents from research institutions. This bibliographic information constitutes a lending library for users in the field.

As far as possible progress and research reports are catalogued under the original number used to register the project descriptions, so that all information about one project may be found in one place.

Research reports are indexed with the same fixed vocabulary that is applied to ongoing project information.

SWIDOC also maintains the Steinmetz Archives, an archive containing selected hard data resulting from research projects such as data processing methods, samples, variables requested, and the like.

NEW ZEALAND

32.1 NEW ZEALAND COUNCIL FOR EDUCATIONAL RESEARCH (NZCER)

Education House
178–182 Willis Street
P.O. Box 3237
Wellington 1
New Zealand

Telephone: 867–939
Cable address: EDSEARCH

System status: Operational system initiated in 1974
Person responsible: MR. JOHN E. WATSON, Director

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National—The system covers all research projects sponsored by NZCER.
Subject coverage: Education research
Institutional coverage: NZCER research projects only
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 6–10
Number of records in active working file: 38
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, principal investigator, project start date and end date, supporting organization name, project funding, subject descriptors or keywords, current status, expected outcome, project type, staff day requirements/year, design or analysis requirements, budget estimates

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text
Source of subject indexing: Author/investigator

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DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

Publications: The New Zealand Council for Educational Research is responsible for the publication of the *New Zealand Journal of Educational Studies*, issued twice a year for $7.50 NZ for the set. Other publications include the *NZCER Annual Report*, which is available free of charge. These publications include information about NZCER-sponsored research projects.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations

User fees: Fees are charged for the publication listed above; no fees are charged for other retrieval services.

ADDITIONAL COMMENTS

It is possible that NZCER may eventually accept responsibility for maintaining a register of all ongoing education research projects in New Zealand.

NORWAY

33.1 INSTITUTE FOR STUDIES IN RESEARCH AND HIGHER EDUCATION
NAFV's UTREDNINGSINSTITUTT

Norwegian Research Council for Science
and the Humanities
Wergelandsveien 15
Oslo 1
Norway

Telephone: (02) 20 65 35

System status: Operational system initiated in 1974
Person responsible: MR. HANS SKOIE, Deputy Director
Institutional affiliations:
Norwegian Research Council for Science and the Humanities
Norges Almenvitenskapelige Forskningsraad (NAFV)

Norwegian Agency for International Development (NORAD)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Engineering, materials technology, earth sciences, biology, medical sciences, agricultural sciences, economics, education, political science, and sociology research that pertains to developing countries
Institutional coverage: Norwegian universities and research institutes
Source of input: Performing organizations

FILE DESCRIPTION:

Language of records: Norwegian, English
Data elements included: Project title, general project summary, project objectives, progress reports, principal investigator, performing organization name, research program of which project is a part, project start date and end date, supporting organization name, project funding, subject descriptors or keywords, bibliographic references, resources applied (man-years, funds)

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services for ongoing research information are provided beyond publication of the catalogs described below.

Publications: The Institute for Studies in Research and Higher Education is responsible for the following publications containing ongoing research information:

NAVF, NLVF, NTNF: Miljoevernforskning ved universiteter, hoegskoler og forskningsinstitutter (*Research on the Environment*) (Oslo, Norway: Institute for Studies in Research and Higher Education, Norwegian Research Council for Science and the Humanities, 1973);

Arbeidsmiljoeforskning (*Research on the Work Environment*) (Oslo, Norway: Institute for Studies in Research and Higher Education, Norwegian Research Council for Science and the Humanities, 1974:76, October 1974); and

Studies in Research and Higher Education 1975:1, Research relevant to Developing Countries: A Catalogue of Research Projects concerning Developing Countries at Norwegian Universities and Research Institutes (Oslo, Norway: Institute for Studies in Research and Higher Education, Norwegian Research Council for Science and the Humanities, January 1975).

PANAMA

34.1 STATISTICS AND CENSUS DIRECTORATE
DIRECCION DE ESTADISTICA Y CENSO

Contraloria General de la Republica
Apartado 5213
Panama 5
Panama

System status: Operational system initiated in 1971
Person responsible: MR. JOAN MANUEL CABALLERO D., Director
Institutional affiliations:

Comptroller General of the Republic
Contraloria General de la Republica

Department of Scientific and Technical Policy
Departamento de Politica Cientifica y Tecnologica

Economic and Social Planning Directorate
Direccion de Planificacion Economica y Social

Ministry of Planning and Economic Policy
Ministerio de Planificacion y Politica Economica

Regional Program of Scientific and Technological Development
Programa Regional de Desarrollo Cientifico y Tecnologico (PRDCYT)

Organization of American States (OAS)
Organizacion de los Estados Americanos (OEA)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, other national organizations, universities, private enterprises and consultants
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records in active working file: 155 (1975)
Language of records: Spanish
Data elements included: Project title, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, subject descriptors or keywords, project type (basic, applied, experimental development), contact person, staff requirements, budget, project status, performing organization telephone number, number and type of resulting publications

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text
Source of subject indexing: Author/investigator

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Statistical analyses of the data base
Publications: The Statistics and Census Directorate has produced two publications containing ongoing research information and the statistical analyses it prepares:

Estadisticas de la Ciencia y la Tecnologia (June 1976), and

Directorio Nacional de Instituciones de Investigacion y Desarrollo o de Difusion y de Empresas Privadas de Servicios de Consultoria (June 1976).

PHILIPPINES

35.1 CARIS LIAISON OFFICE

Technical Services Division
Philippine Council for Agriculture and
Resources Research
Los Banos, Laguna 3723
Philippines

Telephone: 2308, 2269, 2375
Cable address: 2540

System status: Operational system initiated in 1976
Person responsible: MISS MARINA E. BARILE, Librarian
Institutional affiliations:
Technical Services Division (TSD)

Philippine Council for Agriculture and Resources Research (PCARR)

Current Agricultural Research Information System (CARIS)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Agricultural and mineral resources research, excluding mineral resources for petroleum and other mineral oils
Institutional coverage: National government agencies, other national organizations
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 600
New: 40% *Updated:* 60%
Number of records in active working file: 1,200
Frequency of updating: Bimonthly
Language of records: English
Data elements included: Project title, general project summary (planned), project objectives (planned), progress reports (planned), principal investigator, coinvestigators (planned), performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords (planned), commodity group, recommended future budget

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)—Indexes are maintained by commodity group, performing organization, and supporting organization as well.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Punched cards and a computerized system operating in batch mode and on-line with an IBM 370/135 central processing unit and magnetic tape processing and storage capabilities
System software: PARS Form No. 1 is used for processing information about ongoing research projects. PARS Form No. 3 is used for records for completed research projects. These software packages are available for use by others.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, magnetic tapes
Publications: PCARR has compiled *Research in Agriculture, Forestry and Fisheries in the Philippines, February 1976, On-Going Research Projects* in three volumes. The series, to be published annually and distributed free of charge, includes project title listings and administrative data for ongoing and recently completed work, and is arranged in the volumes according to commodity, performing organization, and supporting organization. An associated publication completed in June 1976 is also distributed by PCARR: *Research Priority Areas.* It is compiled at irregular intervals.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations, private sector
User fees: None
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

PCARR is the national liason office for the CARIS program of the Food and Agriculture Organization (FAO) in Rome.

35.2 CURRENT RESEARCH INFORMATION IN SCIENCE AND TECHNOLOGY (CRIST)

Philippine National Secretariat for ASCA Affairs
National Science Development Board
P.O. Box 3596
Manila
Philippines

Telephone: 78-86-62 or 78-23-93
Cable address: ASCAPHIL/NSDB

System status: Developmental stage, initiated in 1972
Persons responsible: MR. DOMINADOR O. REYES, Secretary-General
MISS DELIA E. TORRIJOS, Technical Consultant
Institutional affiliations:
Philippine National Secretariat for ASCA Affairs (ASCAPHIL)

National Science Development Board (NSDB)

Association for Science Cooperation in Asia (ASCA)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National—The system will later become regional and include other ASCA member countries (Australia, Bangladesh, India, Indonesia, Japan, Korea, Malaysia, New Zealand, Pakistan, Singapore, and Thailand).
Subject coverage: Mathematics, physics, engineering, electronics, materials technology, chemistry, biology, medical sciences, and agricultural sciences research
Institutional coverage: National government agencies, other national organizations, private industry
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 1,200
New: 30% *Updated:* 70%
Number of records in active working file: 2,500
Frequency of updating: Semiannual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, specialized equipment

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, combination of UDC and other thesauri adapted to meet system requirements (available under certain conditions for use by others)
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service
Publications: CRIST has produced the following publications containing ongoing research information: *Catalogue of Philippine Scientific and Technological Studies, Volume 1, Agriculture, Supplement to Volume 1,* and *Volume 2, Natural and Applied Sciences (Excluding Agriculture).*

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations, private organizations
Access limitations: Restricted to certain user groups
User fees: None
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

The CRIST system is complemented by the SDI service for bibliographic information provided by the Scientific Library and Documentation Center of NSDB. Copies of progress and final research reports are also available through the CRIST system.

POLAND

36.1 INFORMATION SYSTEM ON SCIENTIFIC WORKS, RESEARCH AND DEVELOPMENT *SYSTEM INFORMACJI O PRACACH NAUKOWO-BADAWCZYCH I ROZWOJOWYCH (SYNABA)*

Centrum Informacji Naukowej, Technicznej i
Ekonomicznej
al. Niepodlegtosci 186
Skr. Poczt. 355
00–950 Warsaw
Poland

Telephone: 25–46–45
Telex: 813716-Cint-PL
Cable address: CENTR-INF.-Warszawa

System status: Planning stage, scheduled for operational status in 1980
Person responsible: MR. ENG. MIECZYSLAW DERENTOWICZ, Director General
Institutional affiliations:

Scientific, Technical and Organizational Information System
System Informacji Naukowej, Technicznej i Organizacyjnej (SINTE)

National Centre for Scientific, Technical and Economic Information
Centrum Informacji Naukowej, Technicznej i Ekonomicznej (CINTE)

Ministry of Science, Higher Education and Technology
Ministerstwo Nauki, Szkolnictwa Wyzszego i Techniki (MNSZWIT)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, other national organizations
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 50,000 (planned)
Number of records in active working file: 50,000 (planned)
Frequency of updating: Two to four times yearly
Language of records: Polish
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary and other types of classifications (available for use by others)
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system with a JS RIAD central processing unit and magnetic tape and disk storage and processing capabilities
System software: SOPS AIDOS developed by VEB ROBOTRON (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base, magnetic tapes

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations
Access limitations: Limited to certain user groups
User fees: None

ADDITIONAL COMMENTS

SYNABA is a specialized, problem-oriented subsystem of SINTE, the integrated national system for scientific and technical information.

PORTUGAL

37.1 SCIENCE AND TECHNOLOGY RESOURCES UNIT
SERVICOS DE INVENTARIO E ANALISE DE RECURSOS (SIAR)

Junta Nacional de Investigacao Cientifica
e Technologica
Avenida Don Carlos I 126
2°. Piso
Lisbon
Portugal

Telephone: 671188/90
Telex: 1290 JUNIC P
Cable address: JNIC – LISBOA

System status: Operational system initiated in 1971
Person responsible: MR. M. COSTA MACEDO, Department Director
Institutional affiliations:
National Board for Scientific and Technological Research
Junta Nacional de Investigacao Cientifica e Tecnologica (JNICT)

Ministry of Planning and Economic Coordination
Ministerio do Plano e Coordenacao Economica

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, colleges and universities, nonprofit organizations, private industry
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 1,500
Number of records in active working file: 1,500
Frequency of updating: Biennial
Language of records: Portuguese
Data elements included: Project title, project objectives, principal investigator, coinvestigators, performing organization name, performing organization address, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed nonhierarchical vocabulary (available for use by others)—Indexing is performed according to national objectives.
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and a computerized system operating in batch mode with an IBM central processing unit and magnetic tape processing and storage capabilities
System software: Standard software packages (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base
Publications: SIAR has produced a yearbook containing ongoing research information, *Anuario da Ciencia e Tecnologia 1975*. Arranged in four sections according to government agencies, colleges and universities, nonprofit organizations, and private enterprise, project descriptions are included in an inventory of researchers and research organizations that also contains staff names, academic degrees, bibliographic information, and equipment available. Registered patents for private enterprises are listed as well. Geographic, institution, subject, and national objective indexes accompany the descriptive information. Regular updates of the yearbook are planned. Ongoing research information is also disseminated in other inventories and reports.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations
User fees: None
Descriptive material: Descriptive material in Portuguese is available on request.

SENEGAL

38.1 NATIONAL CENTRE FOR SCIENTIFIC AND TECHNICAL DOCUMENTATION
CENTRE NATIONAL DE DOCUMENTATION SCIENTIFIQUE AND TECHNIQUE (CNDST)

12, rue Calmette X Thiers
B.P. 3218
Dakar
Senegal

Telephone: 317–85
Cable address: RECHERSITEKNIKE

System status: Developmental stage, initiated in 1976
Person responsible: MR. OMAR DIOP, Directeur
Institutional affiliations:
General Delegation for Scientific and Technical Research
Delegation generale a la recherche scientifique et technique (DGRST)

Prime Minister's Office
Services Premier Ministre (Primature)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, other national organizations
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Language of records: French
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy, machine-readable form

Processing and storage methods: Manual files, punched cards, and a computerized system operating in batch mode using an IBM 370/145 central processing unit with magnetic tape storage and processing capabilities

System software: OSIRIS (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Statistical analyses of the data base

Publications: CNDST produces the following publication annually that contains ongoing research information:

Inventaire du potentiel scientifique et technique.

AVAILABILITY:

Types of organizations served: National government agencies, international organizations

Access limitations: Restricted to certain user groups

User fees: None

Descriptive material: Descriptive material in French is available on request.

ADDITIONAL COMMENTS

CNDST is the national focal point for all scientific and technological information systems, such as the Current Agricultural Research Information System (CARIS) of the Food and Agriculture Organization (FAO) and IRS-UNEP. The system covers bibliographic information in addition to ongoing research information.

SINGAPORE

See Entry 2.1 under Regional Services.

SRI LANKA

39.1 SRI LANKA SCIENTIFIC AND TECHNOLOGICAL INFORMATION CENTRE (SLSTIC) *SRI LANKA VIDYATHMAKA HA KARMIKA PRAVURTHI MADDHIYASTHANAYA (SLVKPM)*

47/5, Maitland Place
Colombo 7
Sri Lanka

Telephone: 96771–3
Cable address: LAKSCIENCE

System status: Operational system initiated in 1974
Person responsible: DR. G. C. N. JAYASURIYA, Secretary-General
Institutional affiliations:
National Science Council of Sri Lanka (NSC)
Sri Lanka Jathika Vidya Sabhawa (SLJVS)

Ministry of Industries and Scientific Affairs (MISA) (principal funding organization)
Karmantha ha Vidyathmaka Katayuthu Pilibanda Amathiyansaya (KVKPA)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Physics, engineering, electronics, earth and space sciences, chemistry, biology, medical sciences, agricultural sciences, economics, education, and sociology research
Institutional coverage: National government agencies, other national organizations
Source of input: Performing organizations

FILE DESCRIPTION:

Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available for use by other)—Conventional classification systems such as UDC/SPINES are used for subject indexing.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: SLSTIC has compiled a *Directory of Scientific Research Projects in Sri Lanka, 1970–1973* (Colombo, Sri Lanka: National Science Council, 1974, 20.00 rupees) containing information on research in progress during that period.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations
User fees: Fees are charged for the publication described; no fees are charged for other retrieval services.

ADDITIONAL COMMENTS

The National Science Council also published the following titles pertaining to scientific research in Sri Lanka:

Current Foreign Science Serials in Sri Lanka Libraries (12.50 rupees);
Sri Lanka S & T Periodicals Directory (10.00 rupees); and
Directory of Scientific and Technical Personnel (15.00 rupees).

SUDAN

40.1 NATIONAL DOCUMENTATION CENTRE
MARKZ AL-TAWTHIQUE AL-QUMI

General Secretariat
National Council for Research
P.O. Box 2404
Khartoum
Sudan

Telephone: 70776
Cable address: Buhuth Khartoum

System status: Developmental stage, initiated in 1973
Person responsible: MRS. MAYMOUNA MIRGHANI, Head
Institutional affiliation:
National Council for Research (NCR)
Al-Majlis al-Qumi lil Buhuth

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Engineering, materials technology, earth and space sciences, astronomy and astrophysics, biology, medical sciences, agricultural sciences, anthropology, demography, economics, and sociology research
Institutional coverage: National government agencies
Source of input: Individual scientists (National Council for Research-sponsored projects only)

FILE DESCRIPTION:

Number of records in active working file: 55
Frequency of updating: Annual
Data elements included: Project title, project objectives, progress reports, principal investigator coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, project funding

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations

User fees: None

Descriptive material: Descriptive material in English is available on request.

SWEDEN

41.1 CURRENT BUILDING RESEARCH PROJECTS
BYGGNADSFORSKNING (BOFORSK)

Swedish Institute of Building Documentation
Halsingegatan 49
113 31 Stockholm
Sweden

Telephone: 08-34 01 70

System status: Developmental portion initiated in 1970 of an operational system initiated in 196
Person responsible: MR. ADOLF STERN, Managing Director
Institutional affiliations:
Swedish Institute of Building Documentation
Institutet for byggdokumentation (BYGGDOK)

Swedish Council for Building Research (principal funding organization)
Statens raad for byggnadsforskning (BFR)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Housing, planning, building, and civil engineering research
Institutional coverage: National government agencies
Source of input: Supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 1,000
New: 50% *Updated:* 50%
Number of records in active working file: 3,000
Language of records: Swedish
Data elements included: Project title, principal investigator, coinvestigators, performing organization name, performing organization address, project start date, project number assigned, subject co

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title, fixed subject codes (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Machine-readable form
Processing and storage methods: Computerized system with on-line retrieval and disk storage using IBM 370/165 and Datapoint 2200 computers and Silent 733 terminals
System software: ISIS from ILO in Geneva (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, on-line access

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, and any other user who desires access
User fees: Yes
Descriptive material: A descriptive brochure in Swedish is available on request.

ADDITIONAL COMMENTS

BOFORSK is part of the BYGGDOK system which provides information on published reports, journal articles, and other literature in the fields of housing, planning, building, and civil engineering.

41.2 CURRENT PROJECTS/SCIENTIFIC PUBLICATIONS

Swedish Medical Research Council
Sveavagen 166, 18 tr.
113 46 Stockholm
Sweden

Telephone: 08–32 50 51
(+46-8-32 50 51 international)

System status: Developmental stage
Person responsible: MR. INGWAR LENNERFORS, Chief Administrative Officer
Institutional affiliation:
Swedish Medical Research Council (SMRC)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Medical sciences research
Institutional coverage: National government agencies, other national organizations—The projects are those supported by the Swedish Medical Research Council.
Source of input: Individual scientists

FILE DESCRIPTION:

Language of records: English

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services of this file are provided beyond issuance of the publication described below.
Publications: The Swedish Medical Research Council will regularly produce the following publication containing ongoing research information:

Current Projects/Scientific Publication. The first annual volume is scheduled for publication during 1977.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations

41.3 NATIONAL BOARD OF EDUCATION (NBE)
SKOLOVERSTYRELSEN (SO)

Bureau L3
Karlavagen 108
106 42 Stockholm
Sweden

Telephone: 08–14 06 60

System status: Planning stage, initiated in 1975
Person responsible: MRS. INGER MARKLUND, Assistant Head of Division

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Education research
Institutional coverage: National government agencies (NBE-sponsored projects only)
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 325
New: 30% *Updated:* 70%
Number of records in active working file: 175
Frequency of updating: Annual
Language of records: Swedish
Data elements included: Project title, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available under certain conditions for use by others)
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating on-line and in batch mode with magnetic tape and disk processing and storage capabilities
System software: Custom software packages (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: SDI service, statistical analyses of the data base, magnetic tapes
Publications: Publications containing ongoing research information may be produced by NBE.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations
Access limitations: Restricted to certain user groups
User fees: None

41.4 REGISTER OF ENVIRONMENTAL RESEARCH AND SURVEYS *INFORMATION OM MILJOFORSKNINGS- OCH UNDERSOKNINGSVERKSAMHET (MI-20)*

Miljovaardens informationssystem
Jordbruksdepartementet
Fack
103 20 Stockholm
Sweden

Telephone: 08–24 64 75

System status: Developmental stage initiated in 1975
Person responsible: MR. OLLE OVERBY
Institutional affiliations:
Environmental Values Information System
Miljovaardens informationssystem (MI)

Ministry of Agriculture
Jordbruksdepartementet

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Environmental sciences and occupational safety and health research
Institutional coverage: National government agencies, other national organizations, universities, and others concerned with research in these fields
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 1,000
New: 90% *Updated:* 10%
Number of records in active working file: 1,000
Frequency of updating: Ten times yearly
Language of records: Swedish, plus English titles for 50% of the projects
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end

date, supporting organization name, contract, grant, or project number assigned, subject descriptors or keywords, bibliographic references, performing organization telephone number

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Free vocabulary
Source of subject indexing: Author/investigator, indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating on-line with magnetic tape processing and storage capabilities
System software: ISIS developed by the International Labour Organization (available for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, on-line access

Publications: MI has produced two directories that contain descriptions of current and recently completed research projects:

Svensk miljoforskning: Samlad redovisning av forskning om den yttre miljon 1974–1976—This register contains project descriptions in environmental research arranged into subject chapters, accompanied by indexes for geographic areas, subjects, and researchers;

Svensk miljoforskning: Samlad redovisning av forskning om arbetsmiljon 1974–1976—Descriptions of ongoing and completed research projects in occupational safety and health are presented in subject-oriented chapters, and are accompanied by indexes for industries, subjects, and researchers.

The catalogs are scheduled for revision in 1977.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, and other interested agencies
User fees: Charges are made for computer time only.

ADDITIONAL COMMENTS

Information for about 1,800 research reports in hard copy or microfiche is also available through the system.

41.5 SYSTEM FOR REPORTING PROJECT INFORMATION TO THE ENERGY RESEARCH AND DEVELOPMENT COMMISSION
SYSTEM FOR RAPPORTERING AV PROJEKTINFORMATION TILL DELEGATIONEN FOR ENERGIFORSKNING (DFE-PRINS)

Delegationen for energiforskning
Sveavagen 9–11, 9 tr.
111 57 Stockholm
Sweden

Telephone: 08–763 10 00
(+46–8–763 10 00 international)
Telex: 19350 Y UDSTH S

System status: Operational system initiated in 1976
Persons responsible: MR. S. WENNERBERG, Executive Member
MR. AAKE HUGARD, Assistant Commission Secretary

Institutional affiliations:
Energy Research and Development Commission
Delegationen for energiforskning (DFE)

Swedish Ministry of Industry
Industridepartementet

Smithsonian Science Information Exchange (SSIE)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National—The system covers all projects within the Swedish Governmental Main Programme of Energy Research and Development.
Subject coverage: Nonnuclear energy research
Institutional coverage: National government agencies, other national organizations, private industry
Source of input: Supporting organizations within the Main Programme

FILE DESCRIPTION:

Number of records processed annually: 500
New: 20%-30% *Updated:* 70%-80%
Number of records in active working file: 442
Frequency of updating: Biannual
Language of records: Swedish and English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, period for the project description

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Swedish indexing vocabulary which follows the program structure of the Main Programme of Energy Research and Development, plus SSIE's fixed hierarchical vocabulary in English in the publication described below

Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

Publications: DFE-PRINS is planning to publish a complete catalog of ongoing research project information in the field of energy research and development in the English language during 1978. The catalog, composed from DFE input by SSIE, will contain full project descriptions accompanied by subject, investigator, performing organization, and supporting organization project number indexes. At present a listing of ongoing research project titles, performing organizations, supporting organizations, and investigators is available.

AVAILABILITY:

Types of organizations served: National government agencies, national organizations, foreign organizations, international organizations

User fees: Yes

Descriptive material: Descriptive material in Swedish is available on request.

ADDITIONAL COMMENTS

DFE-PRINS input is subsequently included in the SSIE data base. More detailed information on specific projects can be obtained from the supporting organizations.

SWITZERLAND

42.1 ENVIRONMENTAL RESEARCH IN SWITZERLAND
UMWELTFORSCHUNG IN DER SCHWEIZ
RECHERCHES SUR L'ENVIRONNEMENT EN SUISSE

Schweizerische Arbeitsgemeinschaft
fuer Umweltforschung
Im Kirsgarten 22
4108 Therwil
Switzerland

Telephone: 061/73 29 50

System status: Operational system initiated in 1973
Person responsible: DR ERNEST MERIAN, Project Leader
Institutional affiliations:

Swiss Association for Environmental Research
Schweizerische Arbeitsgemeinschaft fuer Umweltforschung (SAGUF)
Association suisse pour la recherche sur l'environnement

Federal Office of Environmental Protection
Eidgenoessisches Amt fuer Umweltschutz
Office federal de la protection de l'environnement

Federal Department of the Interior (principal funding organization)
Eidgenoessisches Departement des Innern (EDI)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Environmental research
Institutional coverage: National government agencies, international organizations of which Switzerland is an active member, cantonal agencies, universities, industries
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 1,551 (1973–1974)
Number of records in active working file: 1,551 (1973–1974)
Frequency of updating: Every three years
Language of records: German, French, and Italian
Data elements included: Project title, general project summary, project objectives, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords—Bibliographic references are planned for the second edition.

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical and nonhierarchical vocabularies (available for use by others)

Source of subject indexing: Indexing staff with scientific background—To improve subsequent editions, international cooperation in the selection of keywords is invited.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form

Processing and storage methods: Manual files, punched cards—Magnetic tape processing and storage is planned for the second edition.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base

Publications: A three-volume catalog last published in 1974–75 by SAGUF is to be reissued every three years: *Umweltforschung in der Schweiz (Recherches sur l'environnement en Suisse)*, available from the Eidgenoessisches Amt fuer Umweltschutz, Laupenstrasse 20, 3008 Bern, Switzerland. *Band 2: Bestandeskatalog (Volume 2: Catalogue des travaux)* contains references to ongoing research as well as citations of published documents. The 1977–78 edition is in preparation.

Other information available from SAGUF includes progress reports, environmental research potential, and "who-is-who" in environmental research.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations, universities, industry

User fees: None to members and official agencies

Descriptive material: Descriptive material in French and German is available on request.

ADDITIONAL COMMENTS

This inventory of ongoing and completed research projects (the second volume of *Umweltforschung in der Schweiz)* is concerned with environmental protection in Switzerland and was undertaken by a committee of SAGUF in order to determine the problems and deficiencies in Swiss environmental research. The first volume *(Band 1: Einleitung und Verzeichnisse zum Bestandeskatalog) (Volume 1: Introduction et index du catalogue des travaux)* contains an introduction to Volume 2, and indexes of researchers, institutions, keywords, and the like. The third volume *(Band 3: Fragenkatalog) (Volume 3: Catalogue des problemes)* contains discussions, reviews, and analyses of the state-of-the-art, as well as lists of problems concerning Swiss environmental research.

42.2 INFORMATION ON EDUCATIONAL RESEARCH IN SWITZERLAND (SWINFED)
INFORMATION BILDUNGSFORSCHUNG SCHWEIZ
INFORMATION SUR LA RECHERCHE EDUCATIONNELLE EN SUISSE

Swiss Coordination Centre for Research
in Education
Entfelderstrasse 61
5000 Aarau
Switzerland

Telephone: 064/21 19 16
Cable address: KOORD BIFO AARAU

System status: Operational system initiated in 1974
Person responsible: MR. ARMIN GRETLER, Director
Institutional affiliations:

Swiss Coordination Centre for Research in Education
Schweizerische Koordinationsstelle fuer Bildungsforschung (SKBF)
Centre suisse de coordination pour la recherche en matiere d'education
Centro svizzero di coordinazione della ricerca educazionale

Swiss Conference of Cantonal Directors of Public Education (funding organization)
Schweizerische Konferenz der kantonalen Erziehungsdirektoren (EDK)

Office for Science and Research
Amt fuer Wissenschaft und Forschung (AWF)

Federal Department of the Interior (funding organization)
Eidgenoessisches Departement des Innern (EDI)

European Documentation and Information System for Education (EUDISED)
Systeme europeen de documentation et d'information pedagogiques

Council of Europe
Conseil de l'Europe

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Education research
Institutional coverage: National government agencies, other national organizations, universities, cantonal institutes, private institutions, schools
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 50–100
New: 90% *Updated:* 10%—As the system develops, a 50%-50% ratio of new and updated project records is expected.
Number of records in active working file: 350
Frequency of updating: Once, when project is completed
Language of records: German, French
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, performing organization telephone number, type of research, contact person, project status, practical relevance of project, materials used, geographic scope, institutional and/or demographic scope, auxiliary means for data collection or analysis, availability of computerized data, series of statistical classification categories

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)—The EUDISED multilingual thesaurus is used for subject indexing.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system with an IBM 370 central processing unit, plus manual files and punched cards—Information retrieval for documentation purposes is handled manually, while retrieval for statistical purposes is accomplished using punched cards.
System software: SPPS (Statistical Package for the Social Sciences) (available for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base
Publications: *Information Bildungsforschung Schweiz (Information sur la recherche educationnelle en Suisse)* is published by the Swiss Coordination Centre for Research in Education every two to three months in loose-leaf format. Each issue contains approximately ten project descriptions, and is distributed free of charge to 550 recipients in Switzerland and 100 abroad. A special file to store the descriptions is available for Sfrs. 9.-.

The center published a precursor to this serial in conjunction with the Institut romand de recherches et de documentation pedagogiques entitled *La recherche educationnelle en Suisse en 1972* (Aarau and Neuchatel, 1973, 204 pp.). It has also produced several inventories of researchers and research institutions in the field of education in Switzerland.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, cantonal government agencies, research institutions, administrators, teachers, schools, policymakers, and interested individuals
User fees: None
Descriptive material: Descriptive brochures in French and German are available on request.

ADDITIONAL COMMENTS

Project information collected in the SWINFED file is forwarded to the European Documentation and Information System for Education (EUDISED) for inclusion, in part, in the *EUDISED R&D bulletin.* In the SWINFED and EUDISED systems, detailed project descriptions are collected at the onset of work, and again when the work is completed.

In addition to collecting project information, SKBF staff members prepare articles for publication in educational journals based on analyses of the descriptions and of the resulting reports. The center collects and disseminates preprints, unpublished working papers, and machine-readable data resulting from projects as well.

42.3 PROJECT IRRD SWITZERLAND
PROJEKT IDS-SCHWEIZ

IRRD Documentation Centre
Department of Road Traffic
Federal Department of Police
Taubenstrasse 16
3003 Bern
Switzerland

Telephone: 031/61 42 66

System status: Developmental stage, initiated in 1976
Person responsible: MR. A. KOHLER
Institutional affiliations:
Department of Road Traffic
Abteilung Strassenverkehr

Federal Department of Justice and Police
Eidgenoessisches Justiz- und Polizeidepartement (EJPD)

International Road Research Documentation (IRRD)

Organisation for Economic Co-operation and Development (OECD)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Roads and road transport research
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations
Source of input: Supporting organizations—Projekt IDS-Schweiz collects input about ongoing research in the field in Switzerland and contributes it to the International Road Research Documentation (IRRD) program. As an IRRD member, Projekt IDS-Schweiz receives a copy of the entire IRRD data base of ongoing research information throughout the world for use in Switzerland.

FILE DESCRIPTION:

Number of records processed annually: 10–20 (national)
New: 50% *Updated:* 50%
Number of records in active working file: 100 (national)
Frequency of updating: Every three years (however information about new projects is added to the data base annually)
Language of records: English, French, German
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, record status, record source, updating status

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for external use)—Terms are selected from the IRRD trilingual thesaurus (English, French, or German).
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode with magnetic tape processing and storage capabilities
System software: EDV-System TEXT-PAC (modified IBM software package)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service

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AVAILABILITY:

Types of organizations served: National government agencies, other national organizations
Access limitations: Restricted to certain user groups
User fees: None

ADDITIONAL COMMENTS

As part of the IRRD system, Projekt IDS-Schweiz also has access to the bibliographic abstracts in the IRRD file.

42.4 STATISTICAL INFORMATION SYSTEM
SYSTEME D'INFORMATION STATISTIQUE (SIS)

Section instruction, recherche et culture
Bureau federal de statistique
Helvetiastrasse 16
3001 Bern
Switzerland

Telephone: 031/61 86 24

System status: Planning stage, system to be initiated in 1980–1985
Person responsible: MR. WELTEN
Institutional affiliations:
Instruction, Research and Culture Section
Section instruction, recherche et culture

Federal Bureau of Statistics
Bureau federal de statistique

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Research and development statistics in all fields of scientific research
Institutional coverage: National government agencies, universities, private industry, nonprofit organizations

DATA PROCESSING METHODS AND TECHNIQUES:

Processing and storage methods: Punched cards and a computerized system operating in batch mode with an IBM 370/148 central processing unit
System software: Custom software packages

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SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Statistical analyses of the data base

AVAILABILITY:

Types of organizations served: National government agencies, international organizations
User fees: Yes

ADDITIONAL COMMENTS

The Bureau federal de statistique is concerned with compiling a file of complete statistical information on research and development in all fields, which will then be used as the basis for creating a research information system.

In conjunction with these current activities, the bureau is publishing the following:

Resultats de l'enquete 1975 sur l'etat de la recherche et du developpement dans l'administration federale, y compris les entreprises de regie (to be published in summer 1977);

Resultats de l'enquete R&D dans les universites (to be published in fall 1977); and

Resultats de l'enquete R&D dans tous les secteurs (1975) (to be published in winter 1977).

THAILAND

43.1 DIVISION OF RESEARCH REGISTRATION (DRR)
KONG TABIANKARNWIJAI

National Research Council
196 Phaholyothin Road
Bangkhen
Bankgok 9
Thailand

Telephone: 5792286
Cable address: NRC

System status: Developmental stage, initiated in 1975
Person responsible: PROF. SANGA SABHASRI, Secretary-General
Institutional affiliations:
National Research Council (NRC)
Saphawijaihaengshat

Office of the Prime Minister (OPM)
Samnugnayokratamontri

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, computer sciences, materials technology, chemistry, biology, medical sciences, agricultural sciences, anthropology, demography, economics, education, political science, psychology, and sociology research
Institutional coverage: National government agencies, other national organizations
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 1,000
New: 100% *Updated:* 0%
Number of records in active working file: 2,000
Frequency of updating: Annual
Language of records: Thai and English
Data elements included: Project title, project objectives, principal investigator, performing organization name, project start date and end date, project number assigned, subject descriptors or keywords, field of research, project type, working place, type of document

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text
Source of subject indexing: Author/investigator

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form
Processing and storage methods: Manual files and a computerized system

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: DRR plans to publish a periodical directory containing ongoing research information.

AVAILABILITY:

Types of organizations served: National government agencies, international organizations, private organizations
User fees: None

43.2 INDUSTRIAL SERVICE INSTITUTE, CHAING MAI (ISI, CHAINGMAI)

P.O. Box 82
Chaing Mai
Thailand

Telephone: 235494

System status: Operational system initiated in 1973
Person responsible: MR. THAMNU VASINONTA, Chief
Institutional affiliations:
Department of Industrial Promotion (DIP)

Government of Thailand (principal funding organization)

United Nations Development Programme (UNDP)

United Nations Industrial Development Organization (UNIDO)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Engineering, materials technology, and economics research and development—ISI has information on metalworking, tool and die manufacturing, woodworking, ceramics, marketing, and management.
Institutional coverage: National government agencies
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 12
New: 80% *Updated:* 20%
Number of records in active working file: 6
Frequency of updating: Annual
Language of records: Thai
Data elements included: Project title, general project summary, performing organization name, performing organization address, project start date and end date

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available for use by others)
Source of subject indexing: Author/investigator

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form
Processing and storage methods: Manual files and punched cards

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

AVAILABILITY:

Types of organizations served: National government agencies and private enterprises in northern Thailand
User fees: None
Descriptive material: Descriptive material in Thai and English is available on request.

ADDITIONAL COMMENTS

The Industrial Service Institute is a joint UNDP/Government of Thailand project engaged in rendering technical managerial assistance, as well as providing consulting services, to local enterprises in the northern region of Thailand.

TUNISIA

44.1 INFORMATION ON ONGOING RESEARCH IN AGRONOMY AND ASSOCIATED SCIENCES IN TUNISIA
INFORMATION SUR LA RECHERCHE AGRONOMIQUE EN COURS ET LES SCIENCES ASSOCIEES EN TUNISIE

Centre national de documentation agricole
Ministere de l'Agriculture
Tunis
Tunisia

Telephone: 254 869

System status: Developmental stage, initiated in 1976
Person responsible: MR. ALI ROMDHANE, Directeur
Institutional affiliations:

National Agricultural Documentation Centre
Centre national de documentation agricole (CNDA)

Ministry of Agriculture (principal funding organization)
Ministere de l'agriculture

Current Agricultural Research Information System (CARIS)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Earth and agricultural sciences research
Institutional coverage: National government agencies, international organizations, foreign organizations
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records in active working file: 129
Language of records: French
Data elements included: Project title, general project summary, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, supporting organization name, subject descriptors or keywords

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SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed nonhierarichical vocabulary (available for use by others)—Keywords compatible with CARIS subject descriptors are used.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and a computerized system operating in batch mode with an IBM 300/135 central processing unit and magnetic tape processing and storage capabilities
System software: ISIS (ILO) (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, magnetic tapes
Publications: CNDA compiled the first edition of *La recherche en cours, agriculture et sciences associees: programmes, chercheurs, institutions* in December 1976. This directory included descriptions of appropriate research projects from 15 institutions conducting 129 programs with 169 researchers. In addition to project descriptions, indexes for subjects and researchers (arranged by subject specialties), as well as an alphabetical list of researchers and an institutional/research program list of the same names and institutions, were included. Regular updates of the directory are planned.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, general public
User fees: None

ADDITIONAL COMMENTS

Project information collected by CNDA is forwarded to the Current Agricultural Research Information System (CARIS) Coordinating Centre of the Food and Agriculture Organization (FAO) in Rome for incorporation into this worldwide agriculture research information system.

TURKEY

45.1 MINERAL RESEARCH AND EXPLORATION INSTITUTE OF TURKEY DATA BANK
MADEN TETKIK VE ARAMA ENSTITUSU GENEL DIREKTORLUGU DATA BANKASI

MTA Enstitusu Genel Direktorlugu
Ankara
Turkey

Telephone: 234255
Telex: 42741 MTA TR
Cable address: METEA ANKARA

System status: Planning stage, initiated in July 1976
Person responsible: DR. OMER CELENK, Chief, Data Bank and Computer Centre
Institutional affiliations:
Mineral Research and Exploration Institute of Turkey
Maden Tetkik ve Arama Enstitusu Genel Direktorlugu (MTA)

Ministry of Energy and Natural Resources

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Earth sciences including mineral and natural resources and energy research
Institutional coverage: National government agencies (initially MTA only with later plans to cover all national agencies in these fields)
Source of input: Performing organizations

FILE DESCRIPTION:

Language of records: Turkish
Data elements included: Project title, general project summary, principal investigator, subject descriptors or keywords, and other geological, geochemical, and geophysical data such as reserves, production figures, and the like

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (presently making use of available international systems)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Computerized system operating in batch mode with disk and magnetic tape processing and storage (planned)

System software: GRASP with custom modifications (planned)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base, on-line access—Graphic data concerning ongoing projects will be available through the system.

AVAILABILITY:

Types of organizations served: National government agencies (initially MTA only), later other national organizations

Access limitations: Restricted to certain user groups

User fees: None

ADDITIONAL COMMENTS

Relevant geological, geochemical, and geophysical data of interest to MTA will be extracted from reports and other literature and added to the file.

UGANDA

46.1 LIBRARY AND DOCUMENTATION SECTION

National Research Council
Ministry of Planning and Economic
Development
P.O. Box 6884
Kampala
Uganda

Telephone: 33817
Cable address: NATRESCO, KAMPALA

System status: Planning stage, initiated in 1974
Person responsible: MR. A. B. K. NTATE, Chief Research Co-ordinator
Institutional affiliations:
National Documentation and Information Systems

National Research Council (principal funding organization)

Ministry of Planning and Economic Development

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, materials technology, earth and space sciences, astronomy and astrophysics, chemistry, biology, medical sciences, agricultural sciences, anthropology, demography, economics, education, political science, psychology, sociology, and arts and languages research
Institutional coverage: National government agencies, other national organizations, private individuals, local and foreign organizations
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 200
New: 30% *Updated:* 70%
Number of records in active working file: 270
Frequency of updating: Semiannual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, nationality of referees, project status

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base
Publications: The National Research Council will publish annual reports containing ongoing research information. The first edition is now available and covers the period from July 1970 to December 31, 1974. Partial project descriptions are accompanied by some statistical analyses.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations
User fees: None
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

The National Research Council was established in June 1970 to guide and coordinate research throughout Uganda and to ensure that the limited funds available for research are used in the best possible way to spearhead development and welfare for the people of Uganda. The council serves as an advisory and planning body to supervise the finance and conduct of research programs; to plan for research institutions, equipment, and personnel; to evaluate and appraise existing programs; to ensure adequate documentation of research; to promote the dissemination of research information between specialists to administrators and the general public; to assist in coordination of research programs; and to initiate and encourage research.

Since its inception, the main task of the council has been the identification of research priorities in all fields. This task has now been partly completed.

Policies and methods for handling documentation resulting from completed research are now under discussion, as is the development of a system for keeping track of ongoing research projects. No international system for handling ongoing research information has been adopted to date; at present, proposals for research projects are submitted to the council for approval. If this is accomplished, manual files for the project are established. Details on each project are also maintained on a card file for quick reference.

UNION OF SOVIET SOCIALIST REPUBLICS

47.1 ALL-UNION CENTRE FOR SCIENTIFIC AND TECHNICAL INFORMATION *VSESOIUZNYI NAUCHNO-TEKHNICHESKII INFORMATSIONNYI TSENTR (VNTITs)*

Smolnaia 14
185493 Moscow
Union of Soviet Socialist Republics

Telephone: 456-81-91
Cable address: Moscow INFORMNAUKA

System status: Operational system initiated in 1968
Person responsible: DR. V. V. SYTCHEV, Director
Institutional affiliations:
State Committee for Science and Technology (SCST)
Gosudarstvennyi Komitet po Nauke i Tekhnike (GKNT)

USSR Council of Ministers
Soveta Ministrov SSSR

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National (all USSR)
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, other national organizations, design and development organizations, industrial enterprises
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 100,000
Number of records in active working file: 500,000
Language of records: Russian, and other languages of the USSR
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, project funding, contract, grant, or project number assigned, subject descriptors or keywords, bibliographic references, final reports, dissertations

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary—This vocabulary is a two-level subject indexing system (rubricator) that contains 33 classes and about 500 subclasses. The rubricator is used to divide the file into subfiles and to systematize information for publication. File searches are made using sets of keywords with semantic links between them; the keywords are taken from the project title and general project summary.

Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files and a computerized system operating in batch mode with magnetic tape and disk processing and storage—Magnetic tapes are prepared for photocomposition of file contents; full texts of progress and final reports from research projects, as well as dissertations, are stored and reproduced using a microfilm system. On-line access for the computerized system is planned.

System software: ASINET (Automated System for Information in Science and Technology)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base, on-line access (planned)

Publications: VNTITs regularly produces subject- and problem-oriented publications containing ongoing research information, such as:

Bulletin of Registration of Research and Development Projects—This publication is issued 4 to 18 times annually per edition in 25 editions representing the major classes of research. The entries list project titles, principal investigators, and performing organizations for the newest research projects in the data base. It is accompanied by cumulative, biannual indexes.

Computerized Management Systems is an example of one of the problem-oriented publications. In addition to listings of the newest research projects, *CMS* also includes information about progress and final research reports, dissertations, and computer programs and algorithms added to the VNTITs file in this specific field.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, industrial and agricultural enterprises

Access limitations: Restricted to certain user groups

User fees: None

ADDITIONAL COMMENTS

VNTITs is part of the USSR State System for Scientific and Technical Information, a broad network of all-union, sectoral, intersectoral, regional, and industrial information centers and services. VNTITs specializes in collecting, assembling, and processing information on research and development projects in the USSR from the planning stage through the final reporting stage.

Preliminary descriptions of research projects are collected on registration cards; copy for the *Bulletin of Registration of Research and Development Projects* is taken from these cards. Progress and final reports are also collected; these are accompanied by information cards which are entered into the file. The full texts of reports are microfilmed for further storage and dissemination. If no report is issued for a project, the information card will contain references to journal articles, other bibliographic sources, or data files where the results of the research project are reported.

Information cards and full texts of dissertations prepared for scientific degrees also form a part of the VNTITs data base.

VNTITs also produces an abstracting journal of research and development reports and dissertations that is issued in 25 subject area editions, 6 to 48 issues per edition each year.

Information cards are used to prepare the periodical, *Research and Development Abstracts.* Like the *Bulletin* described above, it appears monthly in 25 editions corresponding to major subject classes of research and has cumulative, biannual indexes. *RDA* provides information about progress reports, final reports, and dissertations which result from completed research projects.

VNTITs also maintains a file of unpublished materials on computer algorithms and programs for the State Fund of Computer Software (GFAP). Abstracts of computer programs and algorithms added to the file are published regularly in *Algorithms and Programmes.*

To facilitate dissemination of information about research projects, VNTITs provides copies of its microfilmed records of research reports and dissertations to industrial and regional information centers. Such as depository has existed in Leningrad since 1973, and at the Ukranian Research Institute for Scientific and Technical Information since 1974.

UNITED KINGDOM OF GREAT BRITAIN AND NORTHERN IRELAND

48.1 AGRICULTURAL RESEARCH CURRENT INFORMATION SYSTEM (ARCIS)

Agricultural Research Council
160 Great Portland Street
London W1N 6DT
United Kingdom

Telephone: 01–580 6655

System status: Operational system initiated in 1976
Person responsible: MR. G. M. CRAVITZ
Institutional affiliations:
Agricultural Research Council (ARC)

Permanent Inventory of Agricultural Research Projects (AGREP)

European Communities (EC)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Agricultural sciences research
Institutional coverage: National government agencies, other national organizations
Source of input: Performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 4,500
New: 15% *Updated:* 85%
Number of records in active working file: 4,500
Frequency of updating: Monthly
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, research program of which project is a part, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical and nonhierarchical vocabularies (available for use by others), free keywords
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode and on-line with an IBM 360 central processing unit and magnetic tape storage—Additional storage is provided by punched cards and manual files. Processing and retrieval are accomplished using a visual display unit, teletype, and line printer.
System software: Custom PL/I software package

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base

AVAILABILITY:

Types of organizations served: National government agencies
Access limitations: Restricted to certain user groups
User fees: None
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

Information on ongoing research projects is regularly forwarded by ARCIS for incorporation into the AGREP system of the European Communities (EC).

48.2 CAMPDEN FOOD PRESERVATION RESEARCH ASSOCIATION

Chipping Campden, Gloucestershire GL55 6LD
United Kingdom

Telephone: 0386 840319
Cable address: Campden R.A., Chipping Campden

System status: Operational system established in 1919
Person responsible: MR. H. R. HINTON, M.SC., F.I. Biol., Director of Research
Institutional affiliations:
Funding is provided by the food processing and allied industries as well as by United Kingdom government ministries.

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: International, but primarily Great Britain

Subject coverage: Microbiology, analytical chemistry, materials technology, and agricultural sciences research as they pertain to food preservation

Institutional coverage: National government agencies, other national organizations, foreign organizations, private industry

Source of input: Performing organization (Campden Food Preservation Research Association itself)

FILE DESCRIPTION:

Number of records processed annually: 40
New: 10% *Updated:* 90%

Number of records in active working file: 50–60

Frequency of updating: Monthly

Language of records: English

Data elements included: Project title, project objectives, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, contract, grant, or project number assigned, subject descriptors or keywords, project status

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available under certain conditions for use by others)

Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files, punched cards, and minicomputer with magnetic tape and disk storage and processing capabilities

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base

Publications: Ongoing project information is detailed in an annual report prepared for the Research Committee, *Research Programme.*

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, private industry
Access limitations: Restricted to certain user groups (Campden Food Preservation Research Association Members only)
User fees: Yes
Descriptive material: A brochure describing the organization itself in English is available on request.

ADDITIONAL COMMENTS

The Campden Food Preservation Research Association is an industrial research organization dedicated to serving the food preservation and allied industries, in Great Britain and internationally, by performing test research activities, establishing and disseminating standards, monitoring trade activities, and conducting basic and applied research in the field.

In conjunction with in-house research, the association collects ongoing research information and distributes it to members, as needed.

The association also maintains an extensive library with books, technical reports, standards, and other literature for in-house and, in certain cases, outside loan use. It also produces a series of publications for members that include technical memoranda, technical bulletins, technical and variety trial manuals, quality control standards, annual reports and abstracts of current literature, papers and articles for scientific journals, annual statistical reviews of United Kingdom trade and production by commodity and of EC trade and production of 270 food commodities, and other miscellaneous reports.

48.3 CENTRAL REGISTER OF ECONOMIC RESEARCH

Committee for Economic Research
Civil Service College
11 Belgrave Road
London SW1V 1RB
United Kingdom

Telephone: 01–834 6644

System status: Operational system initiated in 1964
Person responsible: DR. K. J. WIGLEY, Chairman
Institutional affiliations:
Committee for Economic Research

British Civil Service

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Economics research
Institutional coverage: National government agencies, universities, colleges, and institutes
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Frequency of updating: Project records are updated very rarely.
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text—Projects are also indexed according to the project leader's name.
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

AVAILABILITY:

Types of organizations served: National government agencies
Access limitations: Restricted to certain user groups
User fees: None

48.4 COUNTRYSIDE COMMISSION RESEARCH REGISTER

Countryside Commission (England and Wales)
Room 306, John Dower House
Crescent Place
Cheltenham, Gloucestershire GL50 3RA
United Kingdom

Telephone: 0242 21381

System status: Operational system initiated in 1968
Person responsible: MR. L. W. ANDREWS, Secretary (CRRAG)
Institutional affiliations:
Countryside Commission (England and Wales) (principal funding organization)

Countryside Recreation Research Advisory Group (CRRAG)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Countryside recreation and landscape conservation research including related socioeconomic and ecological studies in rural areas
Institutional coverage: National government agencies, other national organizations, local authorities, universities, private consultants
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 100–200
New: 70% *Updated:* 30%
Number of records in active working file: 216
Frequency of updating: Every one or two years
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, bibliographic references, performing organization telephone number

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Free terms
Source of subject indexing: Indexing staff with scientific background (editor of register described below)

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: The Countryside Commission provides no retrieval services for this data base of ongoing research information beyond publication of the register described below.

Publications: Since 1968 the Countryside Commission (England and Wales), in conjunction with CRRAG, has published the *Countryside Commission Research Register.* The current edition, No. 8, presents information on research completed during 1974–1976 and on current research. Previous editions of the register incorporate information on research completed since 1962. The register costs £5.- . In addition to project descriptions arranged by subject, the register includes indexes for geographical regions, individuals, subjects, and supporting and performing organizations.

AVAILABILITY:

Types of organizations served: Local government agencies, educational institutions, libraries, research organizations
User fees: Yes

ADDITIONAL COMMENTS

The Countryside Recreation Research Advisory Group (CRRAG) was established in January 1968 to coordinate efforts of government agencies conducting research in the field. CRRAG now consists of 16 member groups, and continues to fulfill its objectives of harmonizing research efforts of member groups in countryside recreation, promoting research, and providing information to public and private groups about current research studies and techniques.

CRRAG organizes seminars and meetings of interest to the field, and publishes, in addition to the research register, a newsletter entitled *Recreation News.* Questionnaires sent in the January 1976 issue of the news were used to obtain information for the latest edition of the register. Other CRRAG publications include the *Digest of Countryside Recreation Statistics, Outdoor Recreation Information,* and the *Glossary of Countryside Recreation Terms.*

48.5 DEVELOPMENT STUDIES: REGISTER OF RESEARCH IN THE UNITED KINGDOM

Library
Institute of Development Studies
University of Sussex
Brighton, Sussex BN1 9RE
United Kingdom

Telephone: 0273 66261
Telex: 877159 (RR Hove) IDS UNIV SX BTN
Cable address: Development Brighton

System status: Developmental stage, initiated in 1971
Person responsible: MR. MICHAEL H. ROGERS, Librarian
Institutional affiliations:

Institute of Development Studies (IDS)

University of Sussex

Ministry of Overseas Development (ODM) (principal funding organization)

Development Centre

Organisation for Economic Co-operation and Development (OECD)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National (United Kingdom plus field work in developing countries)
Subject coverage: Social sciences including anthropology, demography, economics, education, political science, and sociological research—Very selective coverage is given to social and developmental aspects of medicine and agriculture and to some natural sciences technology material related to problems of economic and social development, primarily in lesser-developed countries.
Institutional coverage: Primarily British universities, some national and international government and nongovernment research organizations
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 375–400
New: 75% *Update:* 25%
Number of records in active working file: 450
Frequency of updating: Biannual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number

assigned, project funding, subject descriptors or keywords, bibliographic references indicating if references exist in the register, geographic interest, cooperating institutions' names and addresses

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary—The "Selective Listings in Combination" (SLIC) method using descriptors from the Macrothesaurus of the Organisation for Economic Co-operation and Development, which is available for use by others, is employed.

Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

Publications: IDS biannually publishes *Development Studies: Register of Research in the United Kingdom* (current edition July 1976, G. E. Gorman, editor) containing ongoing research information. It is ISBN 0 903354 25 X, £3.-. Project descriptions in the register are arranged by performing organization, and are accompanied by indexes for researchers, subjects, geographic areas, supporting organizations, and performing organizations.

The purpose of the register, to be published regularly by the library of the Institute of Development Studies, is to keep British researchers abreast of their colleagues' activities in development studies both in the United Kingdom and overseas, and to inform overseas development personnel and researchers of current work and possible sources of information available to them in the United Kingdom. The guide contains current published and semipublished material on research begun but not yet completed. Participating institutions are listed alphabetically; under each of these, individual projects are listed alphabetically by author under the name of the department where the research is carried out. Separate indexes prepared for each register cover the following: Authors/Researchers, Subjects, Geographical (both regional and alphabetical) Listings, Funding Agencies, and Research Centres.

AVAILABILITY:

Types of organizations served: Academic institutions, Third World research centers, individual researchers

Access limitations: Restricted to certain user groups

User fees: None

Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

IDS participates in the data-gathering activities of the Development Centre at the Organisation for Economic Co-operation and Development (OECD) which serves as a central information facility for all aspects of European development studies research and under whose auspices national registers are being compiled for France, the Federal Republic of Germany, Belgium, and possibly other European countries, as well as for the United Kingdom. The information collected in these registers subsequently becomes part of a computerized data bank at the Development Centre.

The library at IDS provides information dissemination activities primarily for bibliographic materials in the field.

48.6 DHSS-SPONSORED RESEARCH

Department of Health and Social Security
Alexander Fleming House
Elephant and Castle
London SE1 6BY
United Kingdom

Telephone: 01–407 5522, extension 7453
Telex: 883669
Cable address: HEALTHMIN LONDON SE1 6BY

System status: Operational system initiated in 1976
Person responsible: MISS A. M. C. KAHN, Chief Librarian
Institutional affiliation:
Department of Health and Social Security (DHSS)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Medical and social sciences including health and personal social services research
Institutional coverage: National government agencies, other national organizations, academic institutions, local authorities
Source of input: Supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 1,000
New: 20% *Updated:* 80%
Number of records in active working file: 600
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, project objectives, principal investigator, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, project funding, subject descriptors or keywords, confidentiality

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text
Source of subject indexing: Indexing staff without scientific background and clerical staff

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

Publications: DHSS regularly produces the following publications that contain ongoing research information:

Department of Health and Social Security—Annual Report on Departmental Research and Development—The latest and final edition is 1976 (London: HMSO 1977, ISBN 0 11 320272 5, £1.10);

DHSS Handbook of Research and Development—The first edition is 1976 (London: HMSO 1977, ISBN 0 11 320274 1, £2.-). This publication will be updated annually and after 1976 will include an annual report;

Chronically Sick and Disabled Act 1970—Research and Development Work on Equipment for the Disabled—An annual report, DHSS publishes this as required by Section 22 of the Act. The latest edition is for 1975 (House of Commons 481) (London: HMSO 1976, ISBN 0 10 248176 8, £0.30); and

Supplementary Benefits Commission Report for the year ended 31 December 1975 (Cmnd 6615)—This is the first of a proposed series of annual reports about the work of the Supplementary Benefit Commission (London: HMSO 1976, ISBN 0 10 166150 9, £1.85). It contains current research in Chapter 20 and Appendix 10.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, international organizations

User fees: Fees are charged for the publications listed above; no fees are charged for other retrieval services.

48.7 DOE/DTp REGISTER OF RESEARCH

Research Section
Headquarters Library
Departments of the Environment and Transport
2 Marsham Street
London SW1P 3EB
United Kingdom

Telephone: 01–212 5073
Telex: 22221

System status: Operational system initiated in 1974
Person responsible: MR. J. C. CREASEY, Head of Research and Special Services
Institutional affiliations:
Research and Special Services (LIB4)

Headquarters Library (LIB)

Manpower and Management Services (MMS/LIB)

Department of the Environment (DOE)

Department of Transport (DTp)

Transport and Road Research Laboratory (TRRL)

International Road Research Documentation (IRRD)

Permanent Inventory of Environmental Research (ENREP)

Commission of the European Communities (CEC)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Engineering, materials technology, roads and road transport, earth and space sciences, and environmental sciences research concerning building and construction, environmental planning, and pollution
Institutional coverage: National government agencies, other national organizations, public and private industry, private consultants, research institutes, associations and councils
Source of input: Individual scientists, performing organizations

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FILE DESCRIPTION:

Number of records processed annually: 7,000
New: 33% *Updated:* 67%
Number of records in active working file: 7,000
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, performing organization telephone number

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical and nonhierarchical vocabularies (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and a computerized system operating in batch mode with disk processing and storage capabilities—Computerized files for project records are maintained in part at DOE/DTp and in part at TRRL.
System software: Custom software—A new publication production method utilizing the Wang System 20 is under consideration.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, magnetic tapes, limited additional services for national government agencies

Publications: The Headquarters Library, Research and Special Services section produces the *DOE/DTp Register of Research* based on surveys conducted in the United Kingdom each year. The register is a four-volume set, and is distributed free of charge. The four volumes include: *Part I Building and Construction; Part II Environmental Planning; Part III Roads and Road Transport;* and *Part IV Environmental Pollution.* Project descriptions are accompanied by subject, investigator, performing organization, and supporting organization indexes, as well as a list of performing organization addresses and telephone numbers. The 1977 edition is in preparation, and includes approximately 7,000 project descriptions.

Part III Roads and Transport is compiled from information collected by the Transport and Road Research Laboratory (TRRL) in Crowthorne, Berkshire, United Kingdom.

In addition to producing special compilations of information for national government agencies, the DOE Headquarters Library produces a series on "Sources of Information." The following issues are of interest:

Research and Surveys 1976 (ISBN 0 7184 0072 0, series number LIB/INF/24, 1977);

Urban and Regional Research in the United Kingdom 1976–1977 (series number LIB/INF/26, 1977); and

Waste Management Research 1976 (series number LIB/INF/25, 1976).

These publications may be requested from the Headquarters Library Research Section, Room P3/008D, Departments of the Environment and Transport, 2 Marsham Street, London SW1P 3EB, United Kingdom.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations

User fees: None

Descriptive material: Information about the *DOE/DTp Register of Research* in English is available on request.

ADDITIONAL COMMENTS

The DOE/DTp Headquarters Library sends project information in environmental sciences research on behalf of the United Kingdom to ENREP for inclusion in its files. Via TRRL, project information in roads and road transport research is contributed to the IRRD system.

48.8 EDUCATIONAL RESEARCH: A REGISTER OF CURRENT EDUCATIONAL RESEARCH PROJECTS SUPPORTED BY THE SCOTTISH EDUCATION DEPARTMENT

Research and Intelligence Unit
Scottish Education Department
New St. Andrew's House
Saint James Centre
Edinburgh EH1 3SY
United Kingdom

Telephone: 031 556 8400

System status: Operational system initiated in 1975
Person responsible: MR. J. G. MORRIS, HMCI
Institutional affiliations:

Research and Intelligence Unit

Scottish Education Department (SED)

Her Majesty's Government (Scottish Office) (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Subnational (SED-sponsored research only)

Subject coverage: Education research—This system covers all aspects of education relevant to the functions of the Scottish Education Department, including educational psychology, educational sociology, economics of education, and management of education.

Institutional coverage: National government agencies, other national organizations, universities and colleges of education, individuals

Source of input: Performing organizations, supporting organizations—As the system is primarily designed for internal use, information is identified and collected by professional staff members, and supplemented by documentation received from outside organizations on request.

FILE DESCRIPTION:

Number of records processed annually: 50–60

New: 45% *Updated:* 55%

Number of records in active working file: 60

Frequency of updating: Annual

Language of records: English

Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, bibliographic references, performing organization telephone number

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: No subject indexing of project records is performed.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No retrieval services for ongoing research information are offered beyond production of the publication described below.

Publications: SED produces the following document on an annual basis:

Educational Research: A Register of Current Educational Research Projects Supported by the Scottish Education Department. The latest edition is 1976, and it includes project descriptions and a title index.

AVAILABILITY:

Types of organizations served: National government agencies
Access limitations: Restricted to certain user groups (Her Majesty's Inspectorate only)
User fees: None

ADDITIONAL COMMENTS

The Scottish Education Department maintains two separate information systems. One system covers information pertaining to SED-funded research. The information is kept in manual files and published in the form of an annual register which contains project summaries. It is part of a larger information system.

The other system is the Research and Intelligence Unit's own Scottish Education Department Information Retrieval (SEDIR) system. It covers a variety of educational material including books, research reports, government publications, and newspaper cuttings. It is not a comprehensive or systematic collection, and is available only for internal use. It is not concerned exclusively with education research.

48.9 INDEX OF NURSING RESEARCH (INR)

Department of Health and Social Security
Alexander Fleming House
Elephant and Castle
London SE1 6BY
United Kingdom

Telephone: 01–407 5522
Telex: 883669
Cable address: HEALTHMIN LONDON SE1 6BY

System status: Developmental stage, initiated in 1975
Person responsible: MISS A. M. C. KAHN, Chief Librarian
Institutional affiliation:
Department of Health and Social Security (DHSS)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Medical and social sciences including nursing, midwifery, and health visiting research
Institutional coverage: National government agencies, other national organizations, academic institutions, local authorities
Source of input: Supporting organizations

FILE DESCRIPTION:

Frequency of updating: Annual (planned)
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary generally based on thesaurus terms from the U.S. National Library of Medicine's MESH terminology (available for use by others)
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: DHSS plans to produce a printed inventory of research project information.

AVAILABILITY:

Types of organizations served: National government agencies, DHSS management, other interested requestors
User fees: None

48.10 INFORMATION SECTION, HQ

Natural Environment Research Council
Alhambra House
27–33 Charing Cross Road
London WC2H 0AX
United Kingdom

Telephone: 01–930 9232
Telex: 916472
Cable address: Envre London

System status: Developmental stage, initiated in 1975
Person responsible: MR. D. MARGETTS, Head
Institutional affiliations:
Natural Environment Research Council (NERC)

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Department of Education and Science (DES)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National—While the majority of the work is carried out in the United Kingdom, portions of the work may be carried out outside the U.K., i.e. in a single country, or in a region such as Antarctica.

Subject coverage: Physics, engineering, computer sciences, electronics, materials technology, earth and space sciences, chemistry, biology, oceanography including tides and circulation, ecology of terrestial, marine, and freshwater systems, and hydrology research

Institutional coverage: National government agencies and universities funded by NERC component bodies

Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 3,000
New: 10% *Updated:* 90%

Number of records in active working file: 3,000

Frequency of updating: Annual

Language of records: English

Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, research program of which project is a part, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, staff, collaborators, budget allocations

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text and fixed hierarchical vocabulary—Projects are also classified to show the appropriate environmental sector to which the work is relevant. The fixed vocabulary is really another form of classification involving selection of terms from several groups denoting subject, science, location of work, habitat of work, method, and application. A combination of these terms gives a very fine classification scheme.

Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files and a computerized system with batch mode and on-line processing and retrieval capabilities—A Terminet 30 terminal with a twin magnetic tape cassette unit, an AJ832 terminal, and a PDP 10 KI processor with tapes, disks, line printers, and so on are used.

System software: A standard software package MANAGER (also known as OLIVER) is used, and is conditionally available for use by others. This software, written only for PDP 10 computers, has been adopted by NERC for operation of its information system. NERC has developed control, command, and other procedures for use with this software.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base, on-line access

Publications: The Information Section, HQ, is preparing the following publications containing ongoing research information:

Research Grants in the Environmental Sciences 1977 (in press); and

Pollution Research Councils, fifth report 1977 (in preparation).

AVAILABILITY:

Types of organizations served: National government agencies
Access limitations: Restricted to certain user groups
User fees: None

ADDITIONAL COMMENTS

The file is not complete for all NERC research activities, but a substantial experiment covering marine biology and a production system covering all research grants is operational. The system is designed primarily as an in-house resource for management information on staff, resources, and results of work. Wherever possible, the same information is used to satisfy a wide range of information needs and, in some cases, is made available in printed form.

48.11 KINGSTON POLYTECHNIC RESEARCH REPORT

Kingston Polytechnic
Penrhyn Road
Kingston-upon-Thames, Surrey KT1 2EE
United Kingdom

Telephone: 01-549 1366

System status: Operational system initiated in 1965
Person responsible: DR. A. G. CATCHPOLE, Assistant Director
Institutional affiliation:
Kingston Polytechnic

DESCRIPTION OF THE SYSTEM

SCOPE

Geographic coverage: Kingston Polytechnic only

Subject coverage: Mathematics, physics, engineering, computer sciences, electronics, materials technology, earth and space sciences, chemistry, economics, education, political science, psychology, and sociology research

Institutional coverage: Kingston Polytechnic only

Source of input: Performing organization

FILE DESCRIPTION:

Number of records processed annually: 203

New: 51% *Updated:* 49%

Number of records in active working file: 203

Frequency of updating: Biannual

Language of records: English

Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, supporting organization name, contract, grant, or project number assigned, project funding

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: No subject indexing is performed.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Kingston Polytechnic provides no retrieval services from this file beyond publication of the report described below.

Publications: Kingston Polytechnic issues the *Kingston Polytechnic Research Report* that contains part of the ongoing research information collected. The project descriptions are arranged according to academic divisions of the polytechnic, and then according to principal investigator name. The report also includes a list of publications completed by the staff, and a list of higher degrees awarded. The latest edition of the report is 1975.

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AVAILABILITY:

Types of organizations served: Professional societies, universities and polytechnics, industry
User fees: None

48.12 LANCHESTER POLYTECHNIC RESEARCH REPORT

Lanchester Polytechnic
Priory Street
Coventry CV1 5FB
United Kingdom

Telephone: 0203 24166
Telex: 31469

System status: Operational system initiated in 1970
Person responsible: MR. P. A. GIBBS-KENNET, Deputy Registrar
Institutional affiliations:
Lanchester Polytechnic

Coventry Corporation (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Local (covers work in progress at Lanchester Polytechnic)
Subject coverage: Mathematics, physics, engineering, computer sciences, electronics, materials technology, chemistry, biology, demography, economics, political science, psychology, sociology, business, law, management, and urban and regional planning research
Institutional coverage: Covers work in progress at Lanchester Polytechnic
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 300
Number of records in active working file: 300
Frequency of updating: Biennial
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, project funding, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: No subject indexing of project information is performed.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files resulting in a printed report

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Lanchester Polytechnic provides no regular retrieval services for this data base beyond issuing the printed report described below. Inquiries about specific projects are referred to appropriate faculty members and followed up.

Publications: Every two years Lanchester Polytechnic issues the *Lanchester Polytechnic Research Report* containing information on ongoing research at Lanchester Polytechnic. Project information in the report is arranged according to academic organization, by faculty and department.

AVAILABILITY:

Types of organizations served: Academic institutions, libraries, private industry
User fees: None

ADDITIONAL COMMENTS

Completed theses and reports resulting from research projects are available at the institution's library.

48.13 MEDICAL RESEARCH COUNCIL (MRC)

20 Park Crescent
London W1N 4AL
United Kingdom

Telephone: 01-636 5422
Telex: 24897
Cable address: Medresco London

System status: Operational system initiated in 1969
Person responsible: MR. N. H. WINTERTON, SEO (Secretariat)
Institutional affiliation:
Department of Education and Science (DES)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National (United Kingdom Medical Research Council-sponsored research only)
Subject coverage: Biology, medical sciences, and psychology research
Institutional coverage: Medical Research Council only
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records in active working file: 2,500
Frequency of updating: Biennial
Language of records: English
Data elements included: Project title, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, performing organization directors, staff members, or programme leaders

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode with ICL 1903A and ICL 1904S minicomputers and magnetic tape processing and storage capabilities
System software: ICL FIND 2 and custom software packages

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base
Publications: The Medical Research Council publishes a handbook biennially that contains some of the ongoing research information it collects. The latest edition, *Medical Research Council Handbook 1975–76* (London: Medical Research Council, 1976, £3.-) includes information about MRC research establishments and staff, research supported by grants, fellowships, and scholarships, and publications as well as administrative reports. It is accompanied by name, performing organization, committee, and subject indexes.

AVAILABILITY:

Types of organizations served: Medical Research Council only
Access limitations: Restricted to certain user groups
User fees: None

ADDITIONAL COMMENTS

The Medical Research Council, which was established in 1920, has the function of promoting the balanced development of medical and related biological research in the United Kingdom. It employs its own research staff and also provides grants for other institutions and for individuals who are not members of its own staff, thus complementing the research resources of universities and hospitals. In addition the Medical Research Council advises the national government on matters relating to medical research, and cooperates with government departments and other organizations, both national and international.

48.14 PROJECT PROFILES AND INDEX

Schools Council
160 Great Portland Street
London W1N 6LL
United Kingdom

Telephone: 01–580 0352

System status: Operational system initiated in 1971
Person responsible: MRS. S. CHIRNSIDE, Information Officer
Institutional affiliation:
Schools Council

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Subnational (England and Wales)
Subject coverage: Education research and curriculum development
Institutional coverage: HM inspectors, local education authorities, teachers' centers, colleges and departments of education, other educational organizations
Source of input: Supporting organization (Schools Council-sponsored research only)

FILE DESCRIPTION:

Number of records processed annually: 85
Number of records in active working file: 170 (includes completed projects)
Frequency of updating: Biennial
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, performing organization name, performing

organization address, supporting organization name, contract, grant, or project number assigned, project funding, bibliographic references, evaluation, dissemination methods

SUBJECT INDEXING METHODS AND TECHNIQUES:

Source of subject indexing: No subject indexing is performed.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file at in-house location only

Publications: Every two years the Schools Council surveys the projects it is sponsoring that are ongoing or completed, and produces the resulting *Project Profiles and Index* (£3.50). The publication consists of about 170 loose-leaf sheets which can be kept in a ring binder.

Throughout the two-year period, subscribers to the profiles also receive a free bimonthly bulletin, *Project News*, that contains details of new developments in Schools Council projects.

AVAILABILITY:

Types of organizations served: HM inspectors, local education authorities, teachers' centers, colleges and departments of education, other educational organizations, individual teachers, students and schools

User fees: Yes

Descriptive material: Brochures and other materials in English, including a series of wall charts containing brief project descriptions, are available on request.

ADDITIONAL COMMENTS

In addition to profiles of ongoing and completed research and development projects, the Schools Council maintains, at its London location, a complete display for on-site use of research project reports, newsletters, films, tapes, press clippings, and other publications resulting from its research program. Staff members are also available for consultation, if desired.

A general inquiry library at the Schools Council contains information about education topics other than sponsored projects, such as examinations, curricula, and other topics. This library may also be used by on-site visitors for reference.

48.15 R & D PROGRAMMES REGISTER

Department of Industry
Room 201, Abell House
John Islip Street
London SW1P 4LN
United Kingdom

Telephone: 01–211 5927
Telex: 27366
Cable address: ADVANTAGE LONDON SW1

System status: Operational system
Person responsible: MR. D. F. A. EDWARDS
Institutional affiliation:
Department of Industry

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Mathematics, physics, engineering, computer sciences, electronics, materials technology, earth and space sciences, and chemistry research
Institutional coverage: Department of Industry industrial research establishments and firms, research associations, and educational establishments under contract to the Department of Industry
Source of input: Supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 500
New: 70% *Updated:* 30%
Number of records in active working file: 3,140
Frequency of updating: Monthly
Language of records: English
Data elements included: Project title, general project summary, performing organization name, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords, confidentiality, committee

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: VISIscan punched cards and project sheets housed in arched files for manual and punched card retrieval

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

AVAILABILITY:

Types of organizations served: National government agencies
User fees: None

48.16 REGISTER OF EDUCATIONAL RESEARCH IN THE UNITED KINGDOM

National Foundation for Educational Research
in England and Wales
The Mere, Upton Park
Slough, Berkshire SL1 2DQ
United Kingdom

Telephone: 28161

System status: Operational system initiated in 1973
Persons responsible: MR. J. DAVIES, Head of Information Division
MRS. JOY A. FOSKETT, Project Leader
Institutional affiliations:
National Foundation for Educational Research in England and Wales (NFER)

Department of Education and Science (DES)

Social Science Research Council (SSRC)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Education research
Institutional coverage: National government agencies, other national organizations, universities, colleges of education, polytechnics, local government agencies
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 1,700
New: 70% *Updated:* 30%
Number of records in active working file: 3,796
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available under certain conditions for use by others)--The vocabulary is taken from *The London Education Classification,* 2nd edition, by D. J. Foskett and Joy A. Foskett.
Source of subject indexing: Author/investigator, indexing staff with scientific background—Subject indexing is performed by Mrs. Foskett, Project Leader.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and a computerized system with magnetic tape processing and storage capabilities—Computerized processing services are provided by the Institution of Electrical Engineering INSPEC/PPL services and International Information Services for Physicists and Engineers, Peter Peregrinus Ltd., Station House, Nightingale Road, Hitchin, Hertfordshire, United Kingdom.
System software: IBM software packages

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No other retrieval services are provided beyond production of the publication described below.

Publications: NFER has compiled the *Register of Educational Research in the United Kingdom* based on the results of a questionnaire survey conducted by the Department of Education and Science. The latest edition is Volume 2 for 1976–1977. It contains descriptions of approximately 1,700 current and recently completed research projects in the field active during these years at about 240 institutions in the United Kingdom. Project descriptions are arranged by institution, and are accompanied by author and subject indexes. The price is £15.-, O/N 8061 02 1. Microfiche editions are also available.

Further updates of the register are planned, and efforts are now centered on refining data collection methods, as well as identifying the most economical and efficient way to maintain and update project records. Alternate means of presentation of register contents such as computer printouts, microform, or video display terminals in an on-line system are also under consideration.

AVAILABILITY:

Types of organizations served: Any interested organization or individual
User fees: Yes
Descriptive material: Descriptive material in English is available on request.

48.17 REGISTER OF RESEARCH ON MACHINE TOOLS AND RELATED PRODUCTION ENGINEERING

Machine Tool Industry Research Association
Hulley Road
Macclesfield, Cheshire SK10 2NE
United Kingdom

Telephone: 0625 25421–3, 0625 26189
Telex: 669693 Nuloy f.a.o. MTIRA

System status: Operational system initiated in 1975
Person responsible: MR. NEIL PERCIVAL, Administrative Officer
Institutional affiliations:
Machine Tool Industry Research Association (MTIRA)

Mechanical Engineering and Machine Tools Requirements Board (MEMTRB)

Department of Industry (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Machine tools and related production engineering research
Institutional coverage: National government agencies, other national organizations, universities, and other educational establishments and research organizations
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 600
New: 16% *Updated:* 84%
Number of records in active working file: 600
Frequency of updating: Biannual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, subject descriptors or keywords, bibliographic references, man-years of effort

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Free-term nonhierarchical vocabulary
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: MTIRA does not provide regular retrieval services of the data file beyond inquiries for information about a single project.

Publications: MTIRA publishes the *Register of Research on Machine Tools and Related Production Engineering* that contains ongoing research information. The 1976 edition is 166 pages, and costs £5.- (£2.50 for MTIRA members). Add £1.- for shipment to Europe, and £3.- for shipment outside the United Kingdom or Europe. The current issue of the register is based on an MTIRA survey made in the spring and summer of 1976. More than 200 industrial research organizations and departments of British universities and polytechnics were approached, and the register contains information on relevant research projects from 99 of these. Information about projects of a confidential nature, or about those carried out by the research departments of industrial companies for their own use, is not included in the register.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
User fees: Yes (see publication prices listed above)
Descriptive material: Descriptive material in English is available on request.

48.18 RESEARCH AND DEVELOPMENT–INFORMATION AND LIBRARY SCIENCE (RADIALS)

The Library Association
7 Ridgemount Street, Store Street
London WC1E 7AE
United Kingdom

Telephone: 01–636 7543
Telex: 21897 LALDN G

System status: Operational system initiated in 1974
Person responsible: MR. MICHAEL YELLAND, Development Secretary
Institutional affiliations:
The Library Association (LA)

United Kingdom

Research and Development Department (R & DD)

The British Library (principal funding organization)

International Federation for Documentation
Federation internationale de documentation (FID)

International Information System on Research in Documentation (ISORID)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Information science, documentation, and library science research
Institutional coverage: National government agencies, other national organizations, international organizations, educational, industrial, and commercial institutions, universities and public library systems
Source of input: Individual scientists, in-house staff—All published sources are scanned in order to set up a register. As the register becomes known, institutional "liaison officers" can be utilized, and individual researchers will apply for forms or send in details as they learn of the register.

FILE DESCRIPTION:

Number of records processed annually: 500
New: 35% *Updated:* 65%
Number of records in active working file: 495
Frequency of updating: Biannual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, contact person

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary—Classification Research Group schedules modified for use by LISA (Library and Information Science Abstracts) are used, both to classify and subject index entries.
Source of subject indexing: Editor

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DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: The Library Association publishes ongoing research information in the following semiannual periodical:

RADIALS Bulletin (ISSN 0302 2706, £10.-/year). In addition to project descriptions issues include name, organization, and subject indexes.

AVAILABILITY:

Types of organizations served: Libraries, educational institutions, industrial organizations, universities, public library systems
User fees: Yes
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

RADIALS cooperates with the following organizations by forwarding copies of the bulletin for inclusion in their data bases or files: FID for inclusion in *R&D Projects in Documentation and Librarianship;* ISORID for inclusion in *Bibliography, Documentation, Terminology;* and the University of Maryland for inclusion in *Library & Information Services Today.*

RADIALS is a National Information Transfer Centre in the ISORID program.

48.19 RESEARCH FIELDS IN PHYSICS AT UNITED KINGDOM UNIVERSITIES AND POLYTECHNICS

Institute of Physics
47 Belgrave Square
London SW1X 8QX
United Kingdom

Telephone: 01-235 6111
Telex: 918453

System status: Operational system initiated in 1969
Person responsible: DR. L. COHEN, Executive Secretary
Institutional affiliation:
Institute of Physics

United Kingdom

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Physics research, plus some information in related fields such as materials science, electronics, mathematics, and chemistry
Institutional coverage: Universities and polytechnics in the United Kingdom
Source of input: Performing organizations

FILE DESCRIPTION:

Frequency of updating: Every two or three years
Language of records: English
Data elements included: Principal investigator, performing organization name, performing organization address, research program

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text—Simple subject and investigator name indexes are included in *Research Fields in Physics.*
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and eventually a printed book

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services from this data base are provided beyond publication of *Research Fields in Physics.*

Publications: The Institute of Physics has compiled four editions of *Research Fields in Physics at United Kingdom Universities and Polytechnics.* The latest edition (London: Institute of Physics, 1976, 340 pp., ISBN 0 85498 030, £11.-, U.S. $25.00) contains descriptions of the research activities taking place at United Kingdom institutions, and covers 1,120 research teams at 159 academic departments. Entries are arranged according to department within institutions (listed alphabetically), and are accompanied by indexes to research subjects and personnel. Each entry includes the names of team members; the number of students involved; and the nature, aims, and applications of the research program. The degrees awarded and scholarship and fellowship sources for each department are also presented.

AVAILABILITY:

Types of organizations served: National government agencies, academic institutions, industry
User fees: Yes
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

Research Fields in Physics does not include specific details about individual research projects, but rather presents information about the activities of research teams in general at the program level.

48.20 RESEARCH IN BRITISH UNIVERSITIES, POLYTECHNICS AND COLLEGES (RBUPC)

Bibliographic Services Division
The British Library
7 Rathbone Street
London W1P 2AL
United Kingdom

Telephone: 01–580 3681

System status: Planning stage, initiated in 1976
Person responsible: MS. BARBARA V. HOSBACK
Institutional affiliations:
Bibliographic Services Division

The British Library (principal funding organization)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: United Kingdom academic institutions

FILE DESCRIPTION:

Frequency of updating: Annual
Language of records: English
Data elements included: Project title, principal investigator, performing organization name, project start date and end date, supporting organization name

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: The British Library will provide no retrieval services from this data file beyond publication of the directory described below.

Publications: *Research in British Universities, Polytechnics and Colleges* will be issued in four parts beginning in 1978:

Volume I Physical and Biological Sciences, Index;
Volume II Applied Sciences and Technologies, Index;
Volume III Medical Sciences, Index; and
Volume IV Social Sciences, Index.

Estimated costs for RBUPC are approximately £5.-/volume.

RBUPC will contain ongoing research information now collected individually by polytechnics such as the Wolverhampton, Lanchester, and Kingston Polytechnics described elsewhere.

AVAILABILITY:

User fees: Yes
Descriptive material: A descriptive sheet in English is available on request.

ADDITIONAL COMMENTS

RBUPC is the planned successor to *Scientific Research in British Universities and Colleges* (SRBUC), which was last issued in November 1975 for 1974–1975. Copies of the volumes in this earlier series are still available.

48.21 RESEARCH UNIT

Northern Ireland Council
for Educational Research
Queen's University
52 Malone Road
Belfast BT9 5BS
United Kingdom

Telephone: 661111 extension 4366

System status: Operational system initiated in 1967
Person responsible: DR. J. A. WILSON, Research Director
Institutional affiliations:

Northern Ireland Council for Educational Research (NICER)

Department of Education, Northern Ireland (DENI) (principal funding organization)

National Foundation for Educational Research in England and Wales (NFER)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Subnational—The system covers the research of the Northern Ireland educational system.
Subject coverage: Education research
Institutional coverage: All educational institutions in Northern Ireland
Source of input: Performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 6–8
New: 25% *Updated:* 75%
Number of records in active working file: 6
Frequency of updating: Triannual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: No subject indexing of project records is performed at NICER.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files, punched cards, and a computerized system operating in batch mode with magnetic tape storage and processing capabilities—The computerized system is available through use of the facilities of the Queen's University Computer Centre.
System software: SPSS, BMD, and other purpose-specific software packages

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Statistical analyses of the data base
Publications: The Research Unit of NICER has compiled the following publications that contain ongoing research information:

Register of Research in Education – Northern Ireland: Volume One, 1945–1970 (reprinted edition, 1976, £2.25 including postage);

Register of Research in Education – Northern Ireland: Volume Two, 1970–1972 (1973, £2.25 including postage); and

Register of Research in Education – Northern Ireland: Volume Three, 1972–1975 (1976, £2.25 including postage).

All three volumes of the register are available for £5.50 including postage.

The *NICER Information Bulletin* (annual) and the *Report of the Northern Ireland Council for Educational Research 1975* also include some information about research projects in progress.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, local organizations
Access limitations: Restricted to certain user groups
User fees: Yes
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

The aims of NICER are to carry out special investigations relating to education, to receive suggestions for research, to allocate problems of an educational nature to suitable investigators, and to cooperate with other educational institutions in the development and organization of educational research.

The results of NICER research projects are published in report form; copies are available at nominal fees.

NICER forwards information about its current projects for inclusion in the *Register of Education Research* produced by the National Foundation for Educational Research in England and Wales (NFER).

48.22 SOCIAL SCIENCE RESEARCH COUNCIL (SSRC)

1 Temple Avenue
London EC4Y 08D
United Kingdom

Telephone: 01–353 5252

System status: Operational system initiated in 1965
Person responsible: DR. CYRIL SMITH, Secretary to the Council
Institutional affiliations:
The British Library

Department of Education and Science (DES)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Anthropology, demography, economics, education, political science, psychology, sociology, computing, ethnic relations, human geography, linguistics, management and industrial relations, social sciences and the law, and statistics research
Institutional coverage: National organizations other than government agencies, foreign organizations, universities, polytechnics, and recognized research institutes
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 700
New: 50% *Updated:* 50%
Number of records in active working file: 700
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords, fixed nonhierarchical vocabulary
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: SSRC regularly produces the following periodicals containing ongoing research information:

Research Supported by the SSRC, an annual publication available from the School Government Publishing Company, Darby House, Bletchingly Road, Merstham, Redhill RH1 3DN, United Kingdom—The 1976 edition has 494 pages, priced at £2.- plus 20p postage in the United Kingdom. Entries are arranged alphabetically by performing organization, and are indexed alphabetically by investigator and by keywords taken from the title and text; and the

SSRC Newsletter, with three issues annually, contains lists of new grants, and end-of-grant reports filed in The British Library Lending Division. It is free from SSRC.

Other recent SSRC publications containing ongoing research information include:
Register of Educational Research in the UK 1973–1976, 368 pp., NFER Publishing Co., 1976, £12.-;
Political Science Theses Register, Supplement 1975–1976, SSRC, 1976, 65 pp.;
Resource Management Register, Munton and Rees, SSRC, 1974, £1.-; and
Sociology Theses Register (with the British Sociological Association), SSRC, 1976, £1.50.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, press and public
User fees: None
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

The Social Science Research Council is part of The British Library Systems.

48.23 WOLVERHAMPTON POLYTECHNIC RESEARCH

The Robert Scott Library
Wolverhampton Polytechnic
Saint Peter's Square
Wolverhampton WV1 1RH
United Kingdom

Telephone: 0902 27371
Telex: 336301
Cable address: WOLVES POLYTECH

System status: Operational system initiated in 1969
Persons responsible: MRS. SYLVIA G. AYERST, Polytechnic Librarian
MRS. MARY WILKINS, Polytechnic Information Officer
Institutional affiliation:
Wolverhampton Polytechnic

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Local (covers work in progress at Wolverhampton Polytechnic)
Subject coverage: Mathematics, physics, engineering, computer sciences, electronics, materials technology, earth and space sciences, biology, agricultural sciences, economics, education, and sociology research
Institutional coverage: Wolverhampton Polytechnic only
Source of input: Individual investigators

FILE DESCRIPTION:

Number of records in active working file: 173
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, principal investigator, performing organization name, performing organization address

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: No subject indexing of project information is performed.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services for ongoing research information are performed by the library beyond publication of the report described below.

Publications: The Research Board of Wolverhampton Polytechnic issues an annual report that includes short descriptions of research projects in progress plus lists of recent publications by staff members. The information is arranged according to academic organization of the polytechnic, by faculty and department. The last edition of the report was *Research 1975–76: A summary of current researches issued by the Research Board.* An updated edition is in preparation.

AVAILABILITY:

Types of organizations served: Academic institutions and selected research organizations
User fees: None
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

Theses and other research reports resulting from completed work are available in the Wolverhampton Polytechnic library.

UNITED STATES OF AMERICA

49.1 ARCTIC ENVIRONMENTAL INFORMATION AND DATA CENTER (AEIDC)

University of Alaska
707 A Street
Anchorage, Alaska 99501
United States of America

Telephone: (907) 279–4523

System status: Operational system established in 1972
Person responsible: MR. DAVID M. HICKOK, Director
Institutional affiliation:
University of Alaska

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Subnational (State of Alaska)
Subject coverage: Environmental research
Institutional coverage: National government agencies, state and local government agencies, private companies, individual researchers
Source of input: Individual scientists

FILE DESCRIPTION:

Number of records processed annually: 1,300
New: 40% *Updated:* 60%
Number of records in active working file: 1,300
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, principal investigator, coinvestigators, research program of which project is a part, project start date and end date, supporting organization name, subject descriptors or keywords, principal investigator's address and telephone number, coinvestigators' address and telephone number

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Library of Congress subject categories
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: A regular publication containing ongoing research information is published annually entitled: *Current Research Profile for Alaska* (4th edition, Anchorage: Arctic Environmental Information and Data Center, University of Alaska, 1977, U.S. $7.50 for paper copy, U.S. $4.00 for microfiche). The 1977 edition covers 1976 research projects.

AVAILABILITY:

Types of organizations served: National government agencies, private companies, local government agencies, scientists and other private individuals
User fees: Fees are charged for the publication listed above; no fees are charged for other retrieval services.
Descriptive material: A descriptive pamphlet and list of publications in English are available on request.

ADDITIONAL COMMENTS

The University of Alaska's Arctic Environmental Information and Data Center was established in 1972 by the Alaska State Legislature to provide a center for arctic resource and science information services. AEIDC has three complementary groups: information services, resource and science services, and publication and communication services. The three groups find information, synthesize it for application to particular problems, and disseminate it in whatever format is requested. In addition to ongoing research information, AEIDC collects and disseminates data on possible referral sources, unpublished or out-of-print documents, Alaskan weather records, regional resource profiles, background data for environmental impact statements, and the Law of the Sea. A number of publications are available, some including maps and photographs. Publications are produced in hard copy and in microfiche.

49.2 CURRENT RESEARCH INFORMATION SYSTEM (CRIS)

Cooperative State Research Service
U.S. Department of Agriculture
Room 6818 South Building
Washington, District of Columbia 20250
United States of America

Telephone: (202) 447-7273

System status: Operational system initiated in 1967
Person responsible: MR. JOHN R. MYERS, Director
Institutional affiliations:
Cooperative State Research Service (CSRS)

United States Department of Agriculture (USDA)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Agricultural sciences research
Institutional coverage: National government agencies, state government agencies and institutions
Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 24,000
New: 20% *Updated:* 80%
Number of records in active working file: 24,000
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, four classification categories (research activity; commodity, resource, or technology; field of science/discipline; research problem area)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, free nonhierarchical vocabulary (available for use by others)
Source of input: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating on-line and in batch mode with an IBM 370/168 central processing unit and magnetic tape processing and storage capabilities
System software: Custom software packages

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, magnetic tapes, on-line access
Publications: Ongoing research information provided by CRIS is included in the *Inventory of Agriculture,* Volumes I, II, and III, that is published by USDA for each U.S. Government fiscal year.

AVAILABILITY:

Types of organizations served: National government agencies, foreign organizations, state and local organizations
Access limitations: Restricted to certain user groups
User fees: None
Descriptive material: A descriptive brochure in English is available on request.

ADDITIONAL COMMENTS

Full progress reports for research projects in the CRIS system are also available.

Ongoing research project information from the CRIS file is forwarded for inclusion in the Smithsonian Science Information Exchange (SSIE) data base.

49.3 DENTAL RESEARCH DATA OFFICER

National Institute of Dental Research
National Institutes of Health
U.S. Public Health Service
U.S. Department of Health,
Education, and Welfare
Bethesda, Maryland 20014
United States of America

Telephone: (301) 496–7220

System status: Operational system initiated in 1970
Person responsible: DR. KENNETH C. LYNN, Dental Research Data Officer
Institutional affiliations:
National Institute of Dental Research (NIDR)

National Institutes of Health (NIH)

United States Public Health Service (PHS)

United States Department of Health, Education, and Welfare (DHEW)

Smithsonian Science Information Exchange (SSIE)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National (NIDR-sponsored research primarily, plus limited information from other organizations both inside and outside the United States obtained from the SSIE data base)

Subject coverage: Dental sciences research

Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations, schools, clinics, hospitals, research centers, industry

Source of input: Individual scientists, supporting organizations for SSIE data—Input is received from a variety of sources such as grant applications, award notices, contracts, interagency agreements, annual reports, and others.

FILE DESCRIPTION:

Number of records processed annually: 1,200–1,400

New: 20% *Updated:* 80%

Number of records in active working file: 800–1,000

Frequency of updating: Annual

Language of records: English

Data elements included: Project title, general project summary, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, application review codes, budget, academic degree, project officer's name and address, contract status, principal investigator's sex and social security number, and other administrative data

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabularies and others—Combinations of terms from the NIDR Scientific Classification Codes, the National Library of Medicine's Medicine Subject Headings (MeSH), and the National Institute of Health's Computer Retrieval of Information for Scientific Projects (CRISP) are used.

Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files and a computerized system operating on-line and in batch mode with an IBM 370/168 central processing unit, and magnetic tape and disk processing and storage capabilities using IBM 3330 disk units and IBM 2420 tape drives—Computer services are available to the Dental Research Data Officer through the Data Processing Systems and Analysis Section of NIDR; the Research Documentation Section of the Division of Research Grants, NIH; and the Smithsonian Science Information Exchange.

System software: Inquiry Reporting System and Symbolic Logic Retrieval System (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base

Publications: In collaboration with the Smithsonian Science Information Exchange, the Dental Research Data Officer is responsible for production of an annual catalog, *Dental Research in the United States and Other Countries.* The latest edition covering FY1976 is available free of charge, DHEW Publication No. (NIH) 77-88, ISSN 0147 264X. Project descriptions are arranged into chapters according to subject content, and are accompanied by indexes for investigator names, performing organizations, and supporting organizations. All fields of dental research are covered, including dental education, care, delivery systems, and manpower. Previous editions in the series were entitled *Dental Research in the United States and Canada,* 1970; and *Dental Research in the United States, Canada, and Great Britain,* 1971–1975.

NIDR also compiles statistical analyses of its ongoing research programs. The results are published in *National Institute of Dental Research Programs,* the latest edition of which covered *Fiscal Year 1976 Funds,* DHEW Publication No. (NIH) 77-89, ISSN 036 7240. The report provides data on the extramural research grants, training grants and awards, research contracts and interagency agreements, and intramural research projects in the NIDR program. It was published under the title *National Institute of Dental Research Grants and Awards* from 1967 to 1973.

AVAILABILITY:

Types of organizations served: National government agencies

User fees: None

ADDITIONAL COMMENTS

With organizational placement in the Office of the Director of NIDR, the Dental Research Data Officer collects, analyzes, stores, processes, retrieves, and reports on the statistical, scientific, and technical aspects of dental research and training activities from many sources for purposes of program planning and evaluation, and to further the general mission of NIDR to "promote the coordination of researches conducted by the Institute, and similar researches conducted by other agencies, organizations, and individuals."

49.4 ENERGY R&D INVENTORY (ERD)

Office of Environmental Information Systems
Energy Research and Development
Administration
Washington, District of Columbia 20545
United States of America

Telephone: (301) 353-3311

or

Energy R&D Inventory Project
Oak Ridge National Laboratory
Building 3603
P.O. Box X
Oak Ridge, Tennessee 37830
United States of America

Telephone: (615) 483-8611, extension 3-0382

System status: Operational system initiated in 1971
Persons responsible: MR. TED M. ALBERT, Director, Office of Environmental Information Systems
DR. GLORIA M. CATON, Director, Energy R&D Inventory Project
Institutional affiliations:

Office of Environmental Information Systems (EOIN)

Assistant Administrator for Environment and Safety (AES)

United States Energy Research and Development Administration (ERDA)

United States Department of Energy (DOE) (principal funding organization)

Oak Ridge National Laboratory (ORNL)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Energy research
Institutional coverage: National government agencies, state and local government agencies, nonprofit organizations, trade associations, colleges and universities, private industry
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 8,139 (1975)
Number of records in active working file: 8,139 (1975)
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, performing organization type, project type, scientific manpower required

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical and nonhierarchical vocabularies (available for use by others)
Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy, machine-readable form
Processing and storage methods: Manual files and a computerized system operating in batch mode and on-line with IBM 360/91 and 360/75 central processing units, an IBM 2741 terminal, and magnet tape processing and storage capabilities
System software: ORCHIS (Oak Ridge Computerized Hierarchical Information System) (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base, magnetic tapes, on-line access

Publications: ERD has produced the following publications that contain ongoing research information:

An Inventory of Energy Research, Serial R (two volumes, March 1972, ORNL-EIS-72–18, Volume 1, U.S. $9.00, Volume 2, U.S. $6.00)—This publication is available from the National Technical Information Service, U.S. Department of Commerce, Springfield, Virginia 22161, U.S.A.;

Inventory of Current Energy Research and Development, Serial J (three volumes, January 1974, stock numbers 5270–02172, U.S. $9.80, 5270–02173, U.S., $3.10, 5270–02174, U.S. $5.00)—This series is available from the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402, U.S.A.; and

Inventory of Energy Research and Development: 1973–1975, Serial U (five volumes, January 1976)—This series is also available from the Superintendent of Documents. The first three volumes (U.S. $8.60, $12.00, $12.00) contain project descriptions, the fourth (U.S. $13.00) indexes, and the fifth (U.S. $2.30) summary tables of expenditures.

AVAILABILITY:

Types of organizations served: National government agencies
Access limitations: Restricted to certain user groups
User fees: Yes
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

The Energy R&D Inventory project is conducted by the Oak Ridge National Laboratory under contract to the U.S. Department of Energy.

49.5 ENERGY RESEARCH INFORMATION SYSTEM (ERIS)

Old West Regional Commission
228 Hedden Empire Building
Billings, Montana 59101
United States of America

Telephone: (406) 657–6665

System status: Operational system initiated in 1975
Persons responsible: MISS CATHERINE BOYD, Information Specialist
MISS BETH GIVENS, Information Specialist
Institutional affiliations:
Old West Regional Commission (OWRC)

United States Department of Commerce

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Subnational (Old West Region of the United States including the States of Montana, Nebraska, North Dakota, South Dakota, and Wyoming)
Subject coverage: Energy research
Institutional coverage: National government agencies, state government agencies, private industry, private consulting firms, universities, regional government agencies
Source of input: Performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 500
New: 50% *Updated:* 50%
Number of records in active working file: 900
Frequency of updating: Annual
Language of records: English

Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, geographic location, principal investigator's telephone number, performing organization telephone number, other cooperating organizations, sponsoring organization telephone number, availability of reports and publications, proprietary restrictions, project type, data sources

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)—In addition to subject indexing, there is precise geographic location indexing, including county names, regions, river basins, states, and so on.

Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Computerized system operating on-line with magnetic tape and disk processing storage and capabilities using a Decwriter computer terminal—In-house input and storage is via a floppy disk peripheral. Data is transmitted to the computer center for permanent storage.

System software: SELGEM, developed by the Smithsonian Institution for use in organizing museum bibliographies (available for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file

Publications: ERIS publishes the *Energy Research Information System Projects Report* nonserially, but approximately every quarter, that contains ongoing research information. Yearly cumulative geographic location, investigator, and subject indexes are compiled for the report. It is distributed free of charge.

AVAILABILITY:

Types of organizations served: National government agencies, state and regional government agencies, private industry, general public

User fees: None

Descriptive material: Descriptive material in English is available on request.

49.6 FEDERAL INVENTORY OF ENERGY RELATED BIOMEDICAL AND ENVIRONMENTAL RESEARCH

Office of Environmental Information Systems
Energy Research and Development
Administration
Washington, District of Columbia 20545
United States of America

Telephone: (301) 353-3311

System status: Operational system established in 1975
Person responsible: MR. TED A. ALBERT, Director, Office of Environmental Information Systems
Institutional affiliations:
Office of Environmental Information Systems (EOIN)

Assistant Administrator for Environment and Safety (AES)

United States Energy Research and Development Administration (ERDA)

United States Department of Energy (DOE)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Biomedical and environmental research that pertains to energy development and usage
Institutional coverage: National government agencies
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 2,500
New: 75% *Updated:* 25%
Number of records in active working file: 2,466
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, performing organization name, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords, technology, project location, project monitor

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical and nonhierarchical vocabularies (available for use by others)
Source of subject indexing: Author/investigator, headquarters representative

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode and on-line with an IBM 360/75 central processing unit and IBM 3330 disk pack processing and storage capabilities
System software: ORCHIS (Oak Ridge Computerized Hierarchical Information System) (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, on-line access
Publications: EOIN produces the *Federal Inventory of Energy Related Biomedical and Environmental Research.* The series contains descriptions of ongoing research projects in the field sponsored by U.S. Government Agencies presented by agency. The latest edition for U.S. Government Fiscal Year 1976 contains five volumes, publication no. ERDA-77-50-1-V-1, and is available from the National Technical Information Service, 5285 Port Royal Road, Springfield, Virginia 22161, U.S.A. Hard copy editions are (per volume) U.S. $4.00, $16.25, $16.25, $6.75, and $5.50. Microfiche editions are also available.

AVAILABILITY:

Types of organizations served: National government agencies
Access limitations: Restricted to certain user groups
User fees: Yes
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

Under contract with DOE, data processing and on-line access for the file are provided by the Oak Ridge National Laboratory (ORNL); and project information is included in the Energy R&D Inventory (ERD) file maintained at Oak Ridge.

49.7 FOUNDATION GRANTS INDEX DATABASE (GRANTS)

Foundation Center
888 Seventh Avenue
New York, New York 10019
United States of America

Telephone: (212) 975-1120 (New York)

or

Foundation Center
1001 Connecticut Avenue, N.W.
Washington, District of Columbia 20036
United States of America

Telephone: (202) 331-1400 (Washington)

System status: Operational system initiated in 1972
Person responsible: MR. THOMAS R. BUCKMAN, President
Institutional affiliation:
Foundation Center

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: Private foundations in the United States
Source of input: Voluntary reporting from private foundations in the United States

FILE DESCRIPTION:

Number of records processed annually: 12,000
New: 95% *Updated:* 5%
Number of records in active working file: 50,000
Language of records: English
Data elements included: Project title, general project summary, principal investigator, performing organization name, supporting organization name, project funding, subject descriptors or keywords

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text (vocabulary is available under certain conditions for use by others)
Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Computerized system operating on-line with disk processing and storage capabilities using AJ 832, HP 2645, and TI 745 terminals and a Datapoint 1100 minicomputer

System software: Data Retrieval System (DRS)—This software is available under certain conditions for use by others from Aeronautical Research Associates of Princeton (ARAP), 50 Washington Road, Princeton, New Jersey 08540, U.S.A.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base, on-line access through either ARAP or Lockheed Information Systems, Organization 5208, Building 210, 3251 Hanover Street, Palo Alto, California 94304, U.S.A.

Publications: The Foundation Center produces these regular publications containing ongoing research information:

The Foundation Grants Index (bimonthly) included as a separate section in *FOUNDATION NEWS*—A current awareness tool detailing currently reported foundation grants of $5,000 or more with recipient and keyword subject indexes, each listing includes recipient name and geographic location, amount and date of grant, and grant purpose, if available. An average bimonthly index lists more than 1,800 grant awards. *FOUNDATIONS NEWS* (U.S. $20.00/year) can be ordered from: The Council on Foundations, Inc., Box 783, Old Chelsea Station, New York, New York 10011. U.S.A.;

The Foundation Grants Index (annual)—An annual cumulation of the grant information and indexes appearing in *FOUNDATION NEWS*, it includes detailed summaries of about 12,000 grants made by approximately 300 major foundations. The index, U.S. $15.00, can be ordered from Columbia University Press, 136 South Broadway, Irvington, New York 10533, U.S.A.;

The Foundation Grants Index: Subjects on Microfiche (annual)—Grant information from *The Foundation Grants Index* is rearranged by frequently requested broad subject areas and reproduced on microfiche cards (U.S. $3.00/card). Each card includes grant records in one subject field, plus an alphabetical index to the foundations that have made grants in that field. Order cards and lists of available subjects can be obtained from the Foundation Center, 888 Seventh Avenue, New York, New York 10019, U.S.A.

AVAILABILITY:

Access limitations: Retrieval services are provided for members of the Foundation Center Associates Program. The New York and Washington, D.C. libraries operated by the center and cooperating collections are open to the public, and information from the libraries is provided to visitors without charge by reference librarians (photocopy machines and film duplicators in these libraries are available on a fee basis).

User fees: Yes, except as noted above

Descriptive material: A descriptive pamphlet and a list of publications, both in English, are available on request.

ADDITIONAL COMMENTS

The Foundation Center is an independent, not-for-profit organization in the United States dedicated to the gathering, analysis, and dissemination of factual information on United States philanthropic foundations. The center has two main purposes: 1) To compile reliable descriptive data and statistics on the foundation field for the use of foundation trustees and officers, regulatory agencies, and other interested organizations and individuals; and 2) to be a useful resource for anyone interested in applying to grantmaking foundations for funds.

In addition to the publications listed above, the center publishes several volumes concerned with preparing and submitting research proposals to foundations, as well as a directory of foundations in the United States and a volume of their annual reports.

49.8 GOVERNMENT-SPONSORED RESEARCH ON FOREIGN AFFAIRS

Project Information Center
INR/XR/RS
Room 432, SA-6
U.S. Department of State
Washington, District of Columbia 20520
United States of America

Telephone: (202) 235–8079

System status: Operational system initiated in 1973
Person responsible: MRS. BARBARA W. MORLET, Deputy Director for Research Services
Institutional affiliations:

Research Services (RS)

Office of External Research (XR)

Bureau of Intelligence and Research (INR)

United States Department of State (DOS)

Interagency Committee on Foreign Affairs Research (IC/FAR)

Smithsonian Science Information Exchange (SSIE)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Anthropology, demography, economics, education, political science, psychology, sociology, geography, history, intercultural communications, international relations, linguistics, philosophy, and social statistics research
Institutional coverage: National government agencies
Source of input: Supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 550–600
New: 54% *Updated:* 46%
Number of records in active working file: 1,000
Frequency of updating: Quarterly
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, security classification, cosponsor's name and funding, project monitor's name and telephone number, total costs and costs/fiscal year, geographic region and percent of research/region, percent of research/function (political, social-cultural, economic, military, science and technology, general surveys)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed nonhierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff with scientific background, supporting organization project monitor

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating in batch mode with an IBM 370 central processing unit and magnetic tape and punched card processing and storage capabilities
System software: Custom software packages

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file
Publications: The Office of External Research is responsible for publication of the periodic inventory *Government-Sponsored Research on Foreign Affairs* that contains most of the information it collects about ongoing projects in the field. The latest edition, *Government-Sponsored Research on Foreign Affairs: Projects Reported between July 1976 and June 1977,* was published in September 1977, Department of State Publication Number 8917. Project descriptions are accompanied by indexes for geographic regions and subjects. Copies are available from the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402, U.S.A., stock number 044–000–01666–4.

In conjunction with the Smithsonian Science Information Exchange, the Office of External Research is planning to issue quarterly editions of the inventory. The next issue is scheduled for publication in early 1978 and will contain project descriptions accompanied by indexes for subjects, geographic regions, supporting organizations, principal investigators, and contract or grant numbers.

Previous editions of the inventory appeared under the titles *Inventory of Government-Supported Research Projects on Foreign Affairs*, and *Government-Supported Research on Foreign Affairs*.

AVAILABILITY:

Types of organizations served: National government agencies, other interested individuals
User fees: No fees are charged for the publications described above to users in the U.S. Federal Government; fees are charged to other requesters.

ADDITIONAL COMMENTS

The Office of External Research also operates the Foreign Affairs Research (FAR) Documentation Center which collects and disseminates progress and final reports from U.S. Government-sponsored research in the field.

Ongoing research information that appears in *Government-Sponsored Research on Foreign Affairs* is incorporated into the data base of the Smithsonian Science Information Exchange.

49.9 HIGHWAY RESEARCH INFORMATION SERVICE (HRIS)

Transportation Research Board
2101 Constitution Avenue
Washington, District of Columbia 20418
United States of America

Telephone: (202) 389-6358
Cable address: NARECO

System status: Operational system initiated in 1967
Person responsible: MR. ARTHUR B. MOBLEY, Manager
Institutional affiliations:

Network of Transportation Research Information Services (TRISNET)

Transportation Research Board (TRB)

National Research Council (NRC)

National Academy of Sciences (NAS)

United States State Departments of Highways and Transportation (associated funding organizations)

United States Federal Highway Administration (FHWA) (principal funding organization)

United States Department of Transportation (DOT)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National, plus some international coverage

Subject coverage: Highways and highway transportation, nonrail transit, and urban transportation planning research

Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations

Source of input: Individual scientists, performing organizations, supporting organization—HRIS collects information on ongoing research projects directly, acquires information from TRB staff, and also receives input via TRISNET through exchange agreements with the International Road Research Documentation (IRRD) program, the International Road Federation (IRF), and the Smithsonian Science Information Exchange (SSIE).

FILE DESCRIPTION:

Number of records processed annually: 3,500

New: 30% *Updated:* 70%

Number of records in active working file: 11,000

Frequency of updating: Every three years (however information about new research projects is added to the file annually)

Language of records: English

Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, principal investigator's telephone number, responsible individual's name, title, affiliation, and telephone number, project status

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical and nonhierarchical vocabularies (available for use by others), uncontrolled keywords—HRIS employs the IRRD trilingual thesaurus, as well as the *HRIS Thesaurus Term List* (U.S. $90.00/copy), for subject indexing.

Source of subject indexing: Indexing staff without scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form

Processing and storage methods: Computerized system operating in batch mode with an IBM 370/135 central processing unit and magnetic tape processing and storage capabilities

System software: Custom TRB software

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, magnetic tapes, on-line access—On-line access is provided through the contractor Battelle Columbus Laboratories, which operates the TRIS-On-Line Data Base for DOT.

Publications: Ongoing research information from HRIS is published annually in the *World Survey of Current Research and Development on Roads and Road Transport* that is prepared by the International Road Federation (IRF). Prior to 1975 HRIS input appeared in *Highway Research in Progress* published by the Transportation Research Board; the final issue of this title, No. 8, covers April 1974 to July 1975, and copies may be obtained from the Publications Office of TRB (U.S. $40.00/copy).

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, individual researchers

User fees: Yes

Descriptive material: A descriptive brochure in English is available on request.

ADDITIONAL COMMENTS

Ongoing research information forms part of the HRIS data base. The balance of the file consists of information about published materials including abstracts of technical papers, journal articles, and research reports, more than 70,000 machine-readable abstracts in all. HRIS produces *HRIS Abstracts* quarterly (U.S. $40.00/quarter plus postage and handling) to alert users to newest publication abstracts added to the file.

49.10 INTERAGENCY COMMITTEE ON POPULATION RESEARCH (ICPR)

Center for Population Research
National Institute of Child Health
and Human Development
National Institutes of Health
U.S. Public Health Service
U.S. Department of Health,
Education, and Welfare
Landow Building, Room A-721
Bethesda, Maryland 20014
United States of America

Telephone: (301) 496–1101
Cable address: NIH-BETHESDA, MD

System status: Operational system initiated in 1969

Person responsible: DR. PHILIP A. CORFMAN, Director, Center for Population Research and Chairman, ICPR

Institutional affiliations:
Center for Population Research (CPR)

National Institute of Child Health and Human Development (NICHD)

National Institutes of Health (NIH)

United States Public Health Service (PHS)

United States Department of Health, Education, and Welfare (DHEW)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: Biological, medical, demographic, economic, political, psychological, historical, cultural, and sociological research pertaining to population
Institutional coverage: National government agencies, other national organizations, nonprofit associations and foundations
Source of input: Supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 1,500
New: 25% *Updated:* 75%
Number of records in active working file: 1,500
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, principal investigator, performing organization name, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, performing organization city and state or country, type of award (grant, contract, PL 480 award, or intramural)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Subject indexing is performed by broad research areas only. The classification scheme of research areas employed is available for use by others.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and a computerized system operating in batch mode with magnetic tape processing and storage

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SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services of ICPR ongoing research data are available beyond publication of the titles described below.

Publications: ICPR annually produces two publications that contain ongoing research information:

The *Inventory and Analysis of Federal Population Research* contains descriptions of research projects in the field sponsored by agencies of the U.S. Federal Government. It is prefaced by a statistical analysis of the information included in the issue; a section of analyses and recommendations by ICPR based upon these statistics appears next; then the project descriptions themselves are arranged according to broad subject classifications. An investigator index follows. The *Inventory* and *Analysis* were begun in 1969 and were previously published as two volumes. With the latest Fiscal Year 1976 volume, DHEW Publication No. (NIH) 77–133, the two have been combined;

The *Inventory of Private Agency Population Research* includes the same type of information for research projects in the field sponsored by three major nonprofit organizations in the United States, the Ford Foundation, the Population Council, and the Rockefeller Foundation. Begun in 1973, the latest edition is for 1975, DHEW Publication No. (NIH) 77–694.

Individual complimentary copies of these publications are available from the ICPR chairman.

AVAILABILITY:

Types of organizations served: National government agencies, other interested groups

User fees: None

ADDITIONAL COMMENTS

The members of the Interagency Committee on Population Research represent the U.S. Federal Agencies concerned with research related to human population problems, and include:

National Institute of Child Health and Human Development, National Institutes of Health, U.S. Public Health Service, U.S. Department of Health, Education, and Welfare;

Population Studies Group, Economic Research Service, U.S. Department of Agriculture;

Council on Environmental Quality;

U.S. Veterans' Administration;

U.S. National Science Foundation;

Division of Community Planning, Development and Conservation, Office of Policy Development and Research, U.S. Department of Housing and Urban Development;

Office of Current Employment Analysis, Bureau of Labor Statistics, U.S. Department of Labor;

Office of Planning and Evaluation, U.S. Immigration and Naturalization Service;

Office of Population Affairs, U.S. Department of State;

Division of Biomedical and Environmental Research, Energy Research and Development Administration, U.S. Department of Energy;

Office of Assistant Secretary for Policy, Plans and International Affairs, U.S. Department of Transportation;

Bureau of the Census, U.S. Department of Commerce;

Office of Research and Development, U.S. Environmental Protection Agency;

Office of Population, Bureau for Population and Humanitarian Assistance, U.S. Agency for International Development; and the

Interdisciplinary Communications Program, Smithsonian Institution.

The inventories described above are produced by ICPR as part of its mission "to facilitate the exchange of information among those interested in population research; to provide a means of improving coordination of research relevant to the solution of human population problems; and to analyze Federal population research activities and make recommendations on additional research efforts needed in the population sciences."

49.11 MARITIME RESEARCH INFORMATION SERVICE (MRIS)

Transportation Research Board
2101 Constitution Avenue
Washington, District of Columbia 20418
United States of America

Telephone: (202) 389–6687
Cable address: NARECO

System status: Operational system initiated in 1969
Person responsible: MR. DAVIS G. MELLOR, Manager
Institutional affiliations:

Network of Transportation Research Information Services (TRISNET)

Transportation Research Board (TRB)

National Research Council (NRC)

National Academy of Sciences (NAS)

United States Maritime Administration (MarAd) (principal funding organization)

United States Department of Commerce

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National, plus some international coverage
Subject coverage: Maritime transportation research
Institutional coverage: National government agencies, other national organizations, foreign organizations
Source of input: Individual scientists, performing organizations, supporting organizatons—MRIS collects information on ongoing research projects directly, acquires information from TRB staff, and also receives input via TRISNET through exchange agreements with the British Ship Research Association (BSRA), the Smithsonian Science Information Exchange (SSIE), and the Japanese Society of Naval Architects.

FILE DESCRIPTION:

Number of records processed annually: 200
New: 10% *Updated:* 90%
Number of records in active working file: 200
Frequency of updating: Semiannual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, record source, principal investigator's affiliation and telephone number, responsible individual's name, title, affiliation, and telephone number, project type, funding type, contract type, funding allocation by fiscal year

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, free vocabulary
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form
Processing and storage methods: Computerized system operating in batch mode with an IBM 370/135 central processing unit and magnetic tape processing and storage capabilities
System software: Custom TRB software

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service
Publications: MRIS produces two publications regularly that contain ongoing research information:

MRIS Abstracts—Published semiannually, it contains descriptions of current research projects plus abstracts for technical literature added to the MRIS file during the previous six months. Descriptions are accompanied by keyword, author/investigator, and publisher/performing organization/supporting organization indexes. Available only in the United States and Canada, subscriptions are U.S. $50.00/year;

Current Awareness Service—This monthly compilation contains information about current projects, technical literature, and meetings or conferences in the field. Available in the United States and Canada only, subscriptions are U.S. $50.00/year.

AVAILABILITY:

Types of organizations served: National government agencies, researchers in the United States and Canada
Access limitations: Restricted to these user groups
User fees: Yes
Descriptive material: A descriptive brochure in English is available on request.

ADDITIONAL COMMENTS

MRIS includes in its data base bibliographic information about technical literature in maritime transportation research, in addition to ongoing research information.

49.12 NUCLEAR RESEARCH INFORMATION CENTER (NRIC)

American Nuclear Society
555 North Kensington Avenue
La Grange Park, Illinois 60525
United States of America

Telephone: (312) 352–6611

System status: Operational system initiated in 1975
Person responsible: MR. W. MICHAEL DIEKMAN, Manager, Special Projects
Institutional affiliations:
American Nuclear Society (ANS)

Smithsonian Science Information Exchange (SSIE)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National (very limited international information is included as well)
Subject coverage: Nuclear power reactors, nuclear instrumentation and analysis in the physical sciences, medical radioisotopes and related instrumentation research
Institutional coverage: National government agencies, other national organizations, international organizations, foreign organizations, colleges and universities, private industry (limited)
Source of input: Smithsonian Science Information Exchange data base (supporting organizations)

FILE DESCRIPTION:

Number of records processed annually: 1,500
New: 35% *Updated:* 65%
Number of records in active working file: 1,500
Frequency of updating: Annual

Language of records: English

Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date (in some cases), supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references (in some cases), period for the project description, U.S. Government fiscal year

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text

Source of subject indexing: Keyword in Context (KWIC) program of Nuclear Safety Information Center, Oak Ridge National Laboratory, Oak Ridge, Tennessee 37830, U.S.A. (available under certain conditions for use by others)

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Manual files

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: SDI service—Subscribers to the NRIC program receive four quarterly searches on the topics identified each year containing Notices of Research Projects compiled from the Smithsonian Science Information Exchange data base.

Publications: In addition to the quarterly searches, NRIC subscribers receive an annual KWIC index to accompany a year's searches for each topic. The indexes, published by the American Nuclear Society, are compiled by the Nuclear Safety Information Center, Oak Ridge National Laboratory, Oak Ridge, Tennessee 37830, U.S.A. The indexes may be purchased separately, if desired.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations

User fees: Yes

Descriptive material: Brochures in English are available on request.

49.13 RAILROAD RESEARCH INFORMATION SERVICE (RRIS)

Transportation Research Board
2101 Constitution Avenue
Washington, District of Columbia 20418
United States of America

Telephone: (202) 389-6613
Cable address: NARECO

System status: Operational system initiated in 1973
Person responsible: MR. FREDERICK N. HOUSER, Manager
Institutional affiliations:

Network of Transportation Research Information Services (TRISNET)

Transportation Research Board (TRB)

National Research Council (NRC)

National Academy of Sciences (NAS)

United States Federal Railroad Administration (FRA) (principal funding organization)

United States Department of Transportation (DOT)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National, plus some international coverage
Subject coverage: Railroad transporation research
Institutional coverage: National government agencies, other national organizations, foreign organizations, international organizations
Source of input: Individual scientists, performing organizations, supporting organizations—RRIS collects information on ongoing research projects directly, acquires information from TRB staff, and also receives input via TRISNET through exchange agreements with the International Union of Railways (UIC) and the Smithsonian Science Information Exchange (SSIE).

FILE DESCRIPTION:

Number of records processed annually: 500
New: 20% *Updated:* 80%
Number of records in active working file: 550
Frequency of updating: Semiannual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date,

supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, principal investigator's telephone number, cosponsor's name and telephone number, responsible individual's name and telephone number, project status, funding allocation by fiscal year

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form
Processing and storage methods: Computerized system operating in batch mode with an IBM 370/135 central processing unit and magnetic tape processing and storage capabilities
System software: Custom TRB software

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, magnetic tapes, on-line access—On-line access is provided through the contractor Battelle Columbus Laboratories, which operates the TRIS-On-Line Data Base for DOT.
Publications: RRIS publishes ongoing research information along with abstracts of published materials and descriptions of computer programs that have been added to the RRIS data base twice yearly in the *Railroad Research Bulletin.* Issues also contain subject, author/investigator, and source indexes. *Cumulative Indexes* are published at intervals. Subscriptions to the bulletin are U.S. $25.00/year, and back issues may be obtained from the National Technical Information Service, U.S. Department of Commerce, 5285 Port Royal Road, Springfield, Virginia 22161, U.S.A.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, individual researchers
User fees: Yes
Descriptive material: A descriptive brochure in English is available on request.

ADDITIONAL COMMENTS

The Railroad Research Information Service data base is composed of three main sections: ongoing research information; abstracts of technical papers, journal articles, and research project reports beginning with 1973; and descriptions of computer programs from railroads and other sources.

49.14 REAP RESOURCE REFERENCE SYSTEM (R^3S)

Regional Environmental Assessment Program
Provident Life Building, Room 521
316 North Fifth Street
Bismarck, North Dakota 58505
United States of America

Telephone: (701) 224–3700

System status: Operational system initiated in 1977
Person responsible: MRS. LYLA KRAFT, R^3S Coordinator
Institutional affiliations:
Regional Environmental Assessment Program (REAP)

Legislative Council

State of North Dakota

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: Local (State of North Dakota)
Subject coverage: Environmental sciences research
Institutional coverage: National government agencies, state and local government agencies, colleges and universities, private industry
Source of input: Individual scientists, performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 400
Number of records in active working file: 582
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, performing organization name, performing organization address, project start date and end date, supporting organization name, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, geographic area, performing organization telephone number

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating on-line with disk storage and processing capabilities
System software: IBM's STAIRS (Storage and Information Retrieval System)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, on-line access

AVAILABILITY:

Types of organizations served: National government agencies, state and local government agencies, private industry, colleges and universities, individuals
User fees: Yes
Descriptive material: A descriptive brochure in English is available on request.

ADDITIONAL COMMENTS

In addition to the project file described above, R^3S maintains three other files of information in the environmental sciences and related areas of interest: a people file containing descriptions of experts and other individuals whose work might be of interest; a data source file containing descriptions of relevant data collections; and a bibliography file containing entries for published and unpublished papers, reports, books, articles, and manuscripts which cover North Dakota environmental information.

49.15 RESEARCH AND DEVELOPMENT INFORMATION SYSTEM (RDIS)

RDIS Project Office
Electric Power Research Institute
P.O. Box 10412
Palo Alto, California 94303
United States of America

Telephone: (415)493–4800

System status: Operational system initiated in 1974
Person responsible: MR. KENTON B. ANDREWS, Manager
Institutional affiliations:
Electric Power Research Institute (EPRI)

Funding is provided by the electric utility companies of the United States.

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National—International material is received but not entered into data base.
Subject coverage: Mathematics, physics, engineering, computer sciences, electronics, materials technology, chemistry, biology, agricultural sciences, and economics research—All research and development fields of interest to the electric utilities such as nuclear and fossil fuels; power generation, transmission, and distribution; environmental effects; and advanced systems are also covered.
Institutional coverage: Electric utility companies in the United States—Broad bilateral agreements for information exchange have been signed with Electricite de France, the Central Electricity Generating Board, and the Central Research Institute of the Electric Power Industry (CRIEPI) in Japan.
Source of input: Performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 2,800
New: 70% *Updated:* 30%
Number of records in active working file: 3,000
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references, EPRI project managers

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available for use by others)
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Computerized system operating on-line with a Datapoint 1100 central processing unit with floppy disk processing and storage capabilities
System software: RECON IV from Informatics, Inc., Rockville, Maryland, U.S.A.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, on-line access
Publications: EPRI produces these regular publications containing ongoing research information:
Digest of Current Research in the Electric Utility Industry (annual); and

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EPRI Research and Development Projects (quarterly).

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, utility industry, other conditional organizations
User fees: None to EPRI members, nominal to others
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

EPRI is a nonprofit institute supported by the electric utility companies in the United States to evaluate and monitor R & D efforts of the utilities. RDIS is an on-line computerized data base containing information on ongoing unpublished R & D projects of the electric utility industry in the United States. Data are supplied for EPRI-sponsored projects as well as for projects carried out by the individual utilities. On-line access is available through Informatics, Inc. via the Telenet communications system network.

49.16 RESEARCH AND TECHNOLOGY WORK UNIT INFORMATION SYSTEM (WUIS)

Defense Documentation Center
Cameron Station
Alexandria, Virginia 22314
United States of America

Telephone: (202) 274–6991
Telex: 89699

System status: Operational system initiated in 1965
Person responsible: MR. HUBERT E. SAUTER, Administrator
Institutional affiliations:
Defense Documentation Center (DDC)

Defense Logistics Agency (DLA)

Office of the Director of Defense Research and Engineering (ODDR&E)

Office of the Secretary of Defense

United States Department of Defense (DOD)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National with some unclassified Canadian records

Subject coverage: All fields of scientific research—DDC accepts summaries and data in virtually all areas of science and technology which are of interest to Department of Defense research, development, test and evaluation interests.

Institutional coverage: National government agencies, other national organizations, Canadian organizations

Source of input: Performing organizations

FILE DESCRIPTION:

Number of records processed annually: 130,000—Of these, approximately 10,000 are new project records.

New: 13% *Updated:* 87%

Number of records in active working file: 20,600

Frequency of updating: At least annually

Language of records: English

Data elements included: Project title, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, date of description, security level, performance method, resources (man/years, budget), responsible individual's name and telephone number, principal investigator's telephone number

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text, fixed hierarchical vocabulary

Source of subject indexing: Author/investigator, indexing staff with scientific background, computer—DDC employs a technique called "machine-aided indexing" which develops subject terminology from computer analysis of record titles and abstracts. This terminology is either already in a "Natural Language Data Base" and is posted to the file directly; or is equated to terms in existence and posted; or is listed as new terms which are reviewed by analysts/lexicographers with scientific background. These analysts also augment the indexing with additional terms if necessary.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy, machine-readable form

Processing and storage methods: Computerized system operating in batch mode and on-line with a UNIVAC 1108 central processing unit, UNISERVO 16 tape units, 8440 disks, UNISCOPE 100 and 200 terminals

System software: Custom software packages written in Assembly Language and COBOL—System software is being rewritten in higher level languages.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base, magnetic tapes, on-line access

AVAILABILITY:

Types of organizations served: National government agencies and their contractors, subcontractors, and grantees, and DOD potential contractors
Access limitations: Restricted to certain user groups
User fees: None
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

DDC, a field operation of the Defense Logistics Agency, operates an extensive scientific and technical information system for its users. The WUIS data bank of ongoing research information is one of four files located at DDC.

Data about unclassified limited and unlimited research projects in the WUIS system are transmitted to the Smithsonian Science Information Exchange (SSIE) to promote wider dissemination of this information.

The primary data bank at DDC is a file of citations for more than 1 million technical reports resulting from the DOD research, development, test and evaluation (RDT&E) program. All contractors and subcontractors are required to submit copies of research reports for inclusion in the DDC files. Copies of unclassified/unlimited technical reports are forwarded to the National Technical Information Service (NTIS) of the U.S. Department of Commerce for wider dissemination.

Another data bank at DDC is the Research and Development Program Planning Bank. It contains descriptions, updated on an annual basis, of about 25,000 research projects planned by DOD.

The fourth data bank is the Independent Research and Development (IR&D) file which contains descriptions of technical programs being performed by DOD contractors as part of their independent research programs.

Finally, the DDC Technical Library at Cameron Station provides additional services to staff members.

49.17 SMITHSONIAN SCIENCE INFORMATION EXCHANGE (SSIE)

Room 300, 1730 M Street, N.W.
Washington, District of Columbia 20036
United States of America

Telephone: (202) 381–4211
Telex: 89495

System status: Operational system initiated in 1949
Person responsible: DR. DAVID F. HERSEY, President
Institutional affiliation:
Smithsonian Institution (SI)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National, plus limited international coverage in specialized areas of high national concern such as energy, cancer, and water resources research

Subject coverage: All fields of scientific research

Institutional coverage: National government agencies, other national organizations, international organizations, foreign organizations, state and local government agencies, nonprofit associations and foundations, colleges and universities, private industry (limited)—Approximately 80% of the file represents descriptions of research projects, both intramural and extramural, that are sponsored by U.S. Federal Government Agencies. Information is provided on a voluntary basis by over 1,300 supporting organizations.

Source of input: Supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 125,000

New: 40% *Updated:* 60%

Number of records in active working file: 220,000

Frequency of updating: Annual

Language of records: English

Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date (in some cases), supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references (in some cases), period for the project description, U.S. Government fiscal year, project monitor (in some cases)

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed hierarchical vocabulary (available under certain conditions for use by others)—SSIE uses a series of independent hierarchical subject indexes which are open-ended and contain some 40,000 terms divided into about 320 separate indexes. New terms are added as new concepts appear, and obsolete terms are deleted as necessary to reflect changes in the state of the art in any given field.

Source of subject indexing: Indexing staff with scientific background, computer—A system of machine-assisted indexing is used which equates word terms in the title and text of documents processed with terms in SSIE's hierarchical indexes. This system is based on a classifying dictionary containing the 40,000 SSIE subject index terms plus 50,000 synonyms. Assigned index terms are reviewed by staff scientists for relevance, and new terms are added to represent conceptual aspects of the research which cannot be identified by computer.

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form—Approximately 40% of the data base input is received on magnetic tape and processed directly into the system. The balance is received in hard copy and is entered on-line using video display terminals.

Processing and storage methods: Computerized system operating on-line and in batch mode with an IBM 370/138 central processing unit with 524,288 bytes of processor storage, IBM 1441 Model N1 card read/punch, IBM 3203 Model 4 and Mohawk 3160 high-speed printers, eight CalComp Model 235 disk units with 200,000,000 bytes of storage each, five CalComp Model 345 tape drives, and sixteen Bunker-Ramo Model 2206B/17 video display terminals

System software: IBM's Disk Operating System with Virtual Storage (DOS/VS), POWER, and other programs, plus custom software packages written by staff members for data bank operations and other applications such as catalog production—Software packages are written in Assembly, COBOL, and RPG II languages.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base, magnetic tapes, on-line access, searches of the historical file, tables of data, special listings and compilations, thesauri development, indexing, information analysis, specialized data collection, technical assistance and consultancy services—On-line access is available through System Development Corporation's SDC Search Service, 2500 Colorado Avenue, Santa Monica, California 90406, U.S.A.; and is under development for Lockheed Information Systems' Lockheed DIALOG Information Retrieval Service, 3251 Hanover Street, Palo Alto, California 94304, U.S.A.

Publications: SSIE can compile the results of file searches in broad areas of interest into catalog format. Such catalogs contain project information arranged into subject-oriented chapters, plus accompanying subject, investigator, supporting organization, performing organization, and project number indexes compiled automatically by computer. Catalog input is delivered on magnetic tape formatted for input into automatic photocomposition equipment.

The Exchange also produces the *SSIE Science Newsletter* ten times yearly that contains news about services and activities of SSIE, plus articles of interest to the scientific community. The newsletter is U.S. $10.00/year domestically, and $15.00/year outside the United States.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations, colleges and universities, private industry

User fees: Yes

Descriptive material: Descriptive brochures in English are available on request.

ADDITIONAL COMMENTS

SSIE's active search file contains descriptions of basic and applied projects initiated or initiated and completed during the present and past two years. Older project information is stored on magnetic tape and microfilm or on disk in an historical file.

49.18 TOXICOLOGY INFORMATION PROGRAM (TIP)

National Library of Medicine
8600 Rockville Pike
Bethesda, Maryland 20014
United States of America

Telephone: (301) 496–1131

System status: Operational system initiated in 1967
Person responsible: DR. MELVIN J. JOSEPHS, Chief, Biomedical Information Services
Institutional affiliations:

National Library of Medicine (NLM)

Toxicology Information Subcommittee

Committee to Coordinate Toxicology and Related Projects

United States Department of Health, Education, and Welfare (DHEW)

Smithsonian Science Information Exchange (SSIE)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National plus some international coverage
Subject coverage: Toxicology research and related biomedical production and use data
Institutional coverage: National government agencies, other national organizations, foreign organizations, private industry
Source of input: Performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 10,000–12,000
New: 25% *Updated:* 75%
Number of records in active working file: 10,000–12,000
Frequency of updating: Monthly
Language of records: English
Data elements included: Project title, general project summary, project objectives, project methodology or approach, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name,

contract, grant, or project number assigned, project funding, subject descriptors or keywords, some bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Keywords from title or text
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: Manual files and a computerized system

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: No regular retrieval services for this data base are provided beyond production of the publications listed below.

Publications: Ongoing research information is disseminated by the Toxicology Information Program via two publications:

TOX-TIPS—This monthly publication contains descriptions of approximately 500 projects/year collected by TIP that deal with long-term toxicological testing, plus citations for the latest bibliographic information in the field of the individual projects. Indexes for compounds, supporting and performing organizations, and investigators appear in each issue. Subscriptions (U.S. $25.00/year in North America, $35.00/year elsewhere) can be ordered from the National Technical Information Service, U.S. Department of Commerce, 5285 Port Royal Road, Springfield, Virginia 22161, U.S.A. The project descriptions collected by TIP for *TOX-TIPS* are forwarded to the Smithsonian Science Information Exchange (SSIE) for inclusion in its data base;

Toxicology Research Projects Directory—This quarterly publication, which is compiled by SSIE from its data base for TIP, contains descriptions for approximately 10,000–12,000 projects/year that are active in the broad field of manifestations in man and animals resulting from exposure to toxic substances. In addition to project descriptions arranged by subject chapters, there are accompanying indexes for subjects, investigators, performing organizations, supporting organizations, and master grant numbers. This series can also be ordered from the National Technical Information Service (U.S. $75.00/year in North America, $125.00 elsewhere). The publication number is NTISUB/C/021.

AVAILABILITY:

Types of organizations served: National government agencies, libraries, research and development laboratories, toxicologists, and others interested in the field

Access limitations: There are no access limitations on the publications described above; other services provided by TIP are restricted to certain user groups.

User fees: Yes

Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

The Toxicology Information Program was established to create computer-based toxicology data banks from the scientific literature and from the files of collaborating industrial, academic, and government agencies; and to establish toxicology information services for the scientific community.

In addition to ongoing research information, TIP operates a broad range of information files and services in the field. There are four on-line files:

TOXLINE Bibliographic File—This file contains citations for more than 600,000 items taken from the published literature;

CHEMLINE—The file contains records for 250,000 chemical substances that include Chemical Abstracts Service (CAS) registry numbers, molecular formulae, Wiswesser Line Notations, systematic nomenclature, synonyms, ring data, and component line formulae;

Toxicology Data Bank (TDB)—Still in the prototype stage, this file will contain data for approximately 2,500 compounds that are known to be hazardous and to which population groups are exposed;

Laboratory Animal Data Bank (LADB)—In the initial phases of production, this file will contain baseline data on various animal strains from a wide variety of animal colony sources.

TIP also operates the Toxicology Information Response Center (TIRC) at the Oak Ridge National Laboratory. Center members compile information from a number of sources on literature, ongoing research, and other data in response to user requests. Analytical and referral services are also available.

TIP has produced a number of other publications in the field including state-of-the-art reviews, bibliographies on specific topics, and reference directories.

49.19 WATER RESOURCES SCIENTIFIC INFORMATION CENTER (WRSIC)

Office of Water Research and Technology
U.S. Department of the Interior
Washington, District of Columbia 20240
United States of America

Telephone: (202) 343–8436

System status: Operational system initiated in 1965
Person responsible: MR. RAYMOND A. JENSEN, Manager
Institutional affiliations:
Office of Water Research and Technology (OWRT)

United States Department of the Interior

Smithsonian Science Information Exchange (SSIE)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National—Limited coverage of research projects registered by organizations outside the United States is also available.
Subject coverage: Water resources research (defined according to the Committee on Water Resources Research of the U.S. Federal Council for Science and Technology in February 1976)

Institutional coverage: National government agencies, other national organizations, foreign organizations, state governments, universities, research foundations
Source of input: Supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 6,000
New: 35% *Updated:* 65%
Number of records in active working file: 10,000–12,000
Frequency of updating: Annual
Language of records: English
Data elements included: Project title, general project summary, principal investigator, coinvestigators, performing organization name, performing organization address, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords, bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: The open-ended, hierarchical subject indexing system of the Smithsonian Science Information Exchange was used for indexing Volumes 1–11 of the catalog described below. Beginning in 1978, SSIE index points will be equated to the descriptors contained in the *Water Resources Thesaurus* currently applied by WRSIC to bibliographic information, to allow on-line searching with compatible terminology for both ongoing and bibliographic water resources research information from a single computerized file.
Source of subject indexing: Indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy and machine-readable form
Processing and storage methods: Computerized system operating in batch mode and on-line with magnetic tape and disk storage and processing capabilities—Ongoing research information is currently processed in the SSIE system. When a data base is established at the U.S. Department of Energy facilities in Oak Ridge, Tennessee, that computerized system will be employed in addition.
System software: Custom SSIE software packages—SSIE programs permit the formulation of water resources file contents into catalogs, with automatically compiled indexes, in magnetic tape form preformatted to drive photocomposition equipment.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base, magnetic tapes, on-line access—WRSIC ongoing research information is currently accessible from the Smithsonian Science Information Exchange. After early 1978, on-line access will also be available through regional Water Resources Scientific Information Centers to a data base to be established at the Oak Ridge computer facilities of the U.S. Department of Energy.

Publications: In collaboration with the Smithsonian Science Information Exchange, WRSIC was responsible for production of an annual title, *Water Resouces Research Catalog.* The last edition, Volume 11, was published in 1976, Government Printing Office stock number 024–000–00831–2, and is available from the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402, U.S.A., $12.00. The catalog contains descriptions of 2,841 new or continuing but modified research projects in the field, as arranged into chapters according to subject areas, plus indexes for subjects, investigators, performing organizations, and supporting organizations. The first issue in the series was published in 1965. The series is being discontinued in favor of the availability of a more widely accessible on-line search file.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations
User fees: Yes
Descriptive material: Descriptive material in English is available on request.

ADDITIONAL COMMENTS

The Water Resources Scientific Information Center functions within the law which authorizes the Office of Water Research and Technology to engage in "scientific information dissemination activities, including identifying, assembling, and interpreting the results of scientific and engineering research being potentially significant for solution of water resources problems, providing means for improved communications regarding such research results, including operations. . ."

WRSIC operates a full-scale information service that is concerned with bibliographic information as well as ongoing research information.

In carrying out its objective, WRSIC employs the resources and competencies of other organizations through contracts, grants, and exchange agreements, such as the handling of ongoing research information provided by the Smithsonian Science Information Exchange, and the processing of bibliographic information in specialized areas by the University of Wisconsin (water resource economics and eutrophication), Vanderbilt University (thermal pollution), and the University of Florida (eastern United States water law).

WRSIC produces the journal *Selected Water Resources Abstracts* semimonthly to alert scientists, engineers, and managers to the availability of scientific and technical literature on the water-related aspects of the life, physical, and social sciences. This publication is available from the National Technical Information Service, U.S. Department of Commerce, 5285 Port Royal Road, Springfield, Virginia 22161, U.S.A. for $75.00/year domestic, or $95.00/year foreign, with accompanying annual indexes for $100.00 domestic, $125.00 foreign.

WRSIC also compiles topical bibliographies, state-of-the-art reports, and the *Water Resources Thesaurus* discussed above.

Current efforts are focused on the extension of on-line search files for bibliographic and ongoing research information to regional WRSIC centers.

VENEZUELA

50.1 SCIENTIFIC AND TECHNOLOGICAL RESEARCH AND DEVELOPMENT POTENTIAL *POTENCIAL CIENTIFICO Y TECNOLOGICO EN INVESTIGACION Y DESARROLLO*

Dirrecion General de Planificacion
Consejo Nacional de Investigaciones Cientificas y Tecnologicas
Apartado 70617
Caracas 107
Venezuela

Telephone: 35.65.33

System status: Operational system initiated in 1970
Person responsible: MR. ALEJANDRO ARIAS, Division Chief
Institutional affiliations:
General Planning Directorate
Direccion General de Planificacion

National Council for Scientific and Technological Research
Consejo Nacional de Investigaciones Cientificas y Tecnologicas (CONICIT)

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, other national organizations—All research organizations and individuals in the public and private sectors are covered.
Source of input: Individual scientists, performing organizations

FILE DESCRIPTION:

Number of records processed annually: 3,550
New: 12% *Updated:* 88%
Number of records in active working file: 3,500
Frequency of updating: Annual
Language of records: Spanish
Data elements included: Project title, progress reports, principal investigator, performing organization name, performing organization address, research program of which project is a part, project start date and end date

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SUBJECT INDEXING METHODS AND TECHNIQUES:

Vocabulary used: Fixed nonhierarchical vocabulary (available for use by others)

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy

Processing and storage methods: Computerized system operating in batch mode with an IBM 360/50 central processing unit and magnetic tape processing and storage capabilities

System software: Custom software packages (available under certain conditions for use by others)—The software is being modified to make it more flexible and to incorporate frequently used routines. Availability of these modified packages is limited until the modifications are completed and documented.

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, statistical analyses of the data base, magnetic tapes

Publications: The Scientific and Technological Research and Development Potential system is responsible for the production of the following publications that contain ongoing research information:

Directories of Research and Development Organizations; and

Directories of Research and Development Projects.

In addition, directories of scientists and technicians involved in research and development activities are produced.

AVAILABILITY:

Types of organizations served: National government agencies, other national organizations, foreign organizations, international organizations

Access limitations: Restricted to certain user groups

User fees: None

Descriptive material: Descriptive material in Spanish is available on request.

ADDITIONAL COMMENTS

The Scientific and Technological Research and Development Potential system is oriented towards the maintenance of a permanent inventory of financial and human resources dedicated to scientific and technological research in Venezuela.

YUGOSLAVIA

51.1 LABORATORY FOR SYSTEM SCIENCE AND INFORMATICS
LABORATORIJA ZA SISTEME I INFORMATIKU

Institute "Boris Kidric" Vinca
P.O. Box 522
11001 Belgrade
Yugoslavia

Telephone: 444961/202
Telex: YU 11563
Cable address: VINCAINSTITUT

System status: Operational system
Person responsible: DR. PETROVIC MIODRAG, Department Head
Institutional affiliations:
Institute "Boris Kidric" Vinca

Association for Research in Serbia (principal funding organization)
Republicka zajednica nauke Srbije

Council of the Association for Research in Yugoslavia
Savez zajednica za nauku u SFRJ

DESCRIPTION OF THE SYSTEM

SCOPE:

Geographic coverage: National
Subject coverage: All fields of scientific research
Institutional coverage: National government agencies, other national organizations, research and educational institutions
Source of input: Performing organizations, supporting organizations

FILE DESCRIPTION:

Number of records processed annually: 1,351
Number of records in active working file: 1,351
Frequency of updating: Annual
Language of records: Serbo-Croatian
Data elements included: Project title, progress reports, principal investigator, coinvestigators, performing organization name, performing organization address, research program of which project is a part, project start date and end date, supporting organization name, supporting organization address, contract, grant, or project number assigned, project funding, subject descriptors or keywords (planned), bibliographic references

SUBJECT INDEXING METHODS AND TECHNIQUES:

Source of subject indexing: Author/investigator, indexing staff with scientific background

DATA PROCESSING METHODS AND TECHNIQUES:

Form of input: Hard copy
Processing and storage methods: A computerized system operating in batch mode with a CDC 3600 central processing unit and magnetic tape processing and storage capabilities is under development.
System software: RZN NENAD (available under certain conditions for use by others)

SYSTEM SERVICES

INFORMATION SERVICES:

Retrieval services provided: Searches of the current file, SDI service, statistical analyses of the data base
Publications: The Laboratory for System Science and Informatics has published an ongoing research project register, *Registar naucnoistrazivackih i razvojnih projekata koje je prihvatila i finansirala Republicka zajednica nauke Srbije u 1976* (Godini). In addition to project descriptions, it contains indexes for investigators, performing organizations, and supporting organizations.

AVAILABILITY:

Types of organizations served: National government agencies
Access limitations: Restricted to certain user groups
User fees: None

ADDITIONAL COMMENTS

The Laboratory for System Science and Informatics has also published a KWIC index of research project progress reports and a KWIC index of doctoral theses in Belgrade.

Requests for publications may be sent to:
Republicka zajedniza nauke Srbije
Nemanjina 24
11000 Belgrade
Yugoslavia.

The laboratory is part of this larger information system.

Indexes to System and Service Profiles

Index des profils des systèmes et services

Organization and System Names
Noms des organismes et systèmes

Names appearing in capital letters signify system or service profiles. All other names refer to organizational units or organizations affiliated with the systems or services described. English-language names are set in Roman type. All other languages appear in italics.

Abteilung Strassenverkehr 42.3
Academic Council 31.2
Academische Raad 31.2
Agricultural Research Council 48.1
AGRICULTURAL RESEARCH CURRENT INFORMATION SYSTEM 48.1
Agricultural Research Information Centre 19.1
Agricultural Research Organization 21.2
Agriculture, Forestry and Fisheries Research Council Secretariat 24.2
Al-Majlis al-Qumi lil Buhuth 40.1
Alcoholism, Drug Abuse, and Mental Health Administration 1.14
ALL-UNION CENTRE FOR SCIENTIFIC AND TECHNICAL INFORMATION 47.1
American Foundation for the Blind 1.15
American Nuclear Society 49.12
Amt fuer Wissenschaft und Forschung 42.2
ANNUAL DIRECTORY OF RESEARCH PROJECTS 21.1
ANNUAL REPORT OF THE NATIONAL INSTITUTE FOR SCIENTIFIC RESEARCH 9.1
Arbeitsgemeinschaft sozialwissenschaftlicher Institut e. V. 2.18
Arbeitskreis fuer die Dokumentation sozialwissenschaftlicher Forschung 2.3, 2.18
ARCTIC ENVIRONMENTAL INFORMATION AND DATA CENTER 49.1
ARRANGEMENT RETICULE DES INFORMATIONS POUR L'APPROCHE DES NOTIONS PAR LEUR ENVIRONNEMENT 14.12
ASIAN MASS COMMUNICATION RESEARCH AND INFORMATION CENTRE 2.1
Assistant Administrator for Environment and Safety 49.4, 49.6
Association des universites partiellement ou entierement de langue francaise 2.13
Association for Research in Serbia 51.1
Association for Science Cooperation in Asia 35.2
ASSOCIATION FRANCAISE DES INSTITUTS DE RECHERCHE SUR LE DEVELOPPEMENT 14.8
Association internationale de la securite sociale 1.10
Association of Social Sciences Institutes 2.18
Association of Universities (operating) Partly or Entirely in French 2.13
Association suisse pour la recherche sur l'environnement 42.1
Australian Road Research Board 3.2
Austrian Standards Institute 1.11
AUTOMATED INFORMATION SYSTEM FOR FUNDAMENTAL AND APPLIED RESEARCH AND DESIGN TASKS AS WELL AS DISSERTATIONS 8.1
Avdelningen foer spraaklig databehandling 2.10
AVTOMATIZIRANA INFORMATSIONNA SISTEMA ZA REGISTRATSIYA NA NAUCHNO IZSLEDOVATELELSKITE RAZRABOTKI I ZASHCHITENI DISERTATSII 8.1
BANQUE DE DONNEES SUR LES RECHERCHES MENEES DANS LE DOMAINE DE L'ENVIRONMENT 14.4

Organization and System Names

Bibliographic Services Division 48.20
Bibliotheque nationale du Canada 9.6
BIRO KOORDINASI DAN KEBIJAKSANAAN ILMIAH 20.1
Brazilian Agency for Rural Technical Assistance and Extension 7.1
BRAZILIAN CURRENT AGRICULTURAL RESEARCH INFORMATION SYSTEM 7.1
British Civil Service 48.3
British Library, The 48.18, 48.20, 48.22
British Ship Research Association 49.11
BROWN'S GEOLOGICAL INFORMATION SERVICE LTD. 2.2
BULLETIN OF CHEMICAL THERMODYNAMICS 1.1
Bundesanstalt fuer Arbeitsschutz und Unfallforschung 16.3
Bundesanstalt fuer Strassenwesen 2.5
Bundeskammer der gewerblichen Wirtschaft 1.11
Bundesministerium des Innern 16.2
Bundesministerium fuer Verkehr 2.5
Bundesministerium fuer Arbeit und Sozialordnung 16.3
Bundesministerium fuer Bauten und Technik 1.11, 4.1
Bundesministerium fuer Ernaehrung, Landwirtschaft und Forsten 16.1
Bundesministerium fuer Forschung und Technologie 2.3, 2.18, 16.4, 16.5
Bundesversuchs- und Forschungsanstalt Arsenal 4.1
Bureau federal de statistique 42.4
BUREAU FOR COORDINATION AND CENTRALIZATION OF AGRICULTURAL RESEARCH 21.2
Bureau national de l'information scientifique et technique 14.12
BUREAU OF COORDINATION AND SCIENCE POLICY 20.1
Bureau of Health Education 1.20
Bureau of Intelligence and Research 49.8
Bureau of Studies and Coordination 21.1
BYGGNADSFORSKNING 41.1
CAMPDEN FOOD PRESERVATION RESEARCH ASSOCIATION 48.2
Canada Arts Council 9.2
Canada Institute for Scientific and Technical Information 9.4
Canadian Broadcasting Corporation 9.2
Canadian Commission for Unesco 9.2
CANADIAN COMMUNICATIONS RESEARCH INFORMATION CENTRE 9.2
Canadian Plains Research Center 9.3
CANADIAN PLAINS RESEARCH CENTER INFORMATION SYSTEM 9.3
Canadian Radio-television and Telecommunications Comission 9.2
CARIS LIAISON OFFICE 35.1
Center for Disease Control 1.20
Center for Population Research 49.10
CENTRAL ARCHIVE FOR EMPIRICAL SOCIAL RESEARCH 2.3
Central Electricity Generating Board 49.15
Central Information Service 3.3
Central Institute for Information and Documentation of the German Democratic Republic 15.1
Central Institute for Scientific and Technical Information 8.1
CENTRAL PROJECT ADMINISTRATION 31.1
Central Reference and Research Library 17.1
CENTRAL REGISTER OF ECONOMIC RESEARCH 48.3

Central Research Institute of the Electric Power Industry 49.15
CENTRALE PROJECTEN ADMINISTRATIE 31.1
CENTRE CANADIEN D'INFORMATION SUR LA RECHERCHE EN COMMUNICATIONS 9.2
Centre d'assistance technique et de documenation 14.12
CENTRE D'ECHANGE DE L'INFORMATION SUR LA RECHERCHE DANS LES UNIVERSITES SUBVENTIONNEE PAR LE GOUVERNEMENT FEDERAL 9.4
Centre d'etudes africaines 2.13
Centre de developpement 1.12
CENTRE DE DOCUMENTATION 14.5
CENTRE DE DOCUMENTATION ET D'INFORMATION SCIENTIFIQUE 27.1
Centre de documentation pour l'education en Europe 2.6
Centre de documentation sciences humaines 14.1, 14.2, 14.3, 14.7, 14.10
CENTRE DE DOCUMENTATION SUR L'URBANISME 14.6
CENTRE DE DOCUMENTATION SUR LES BIBLIOTHEQUES 9.6
Centre for Agrarian Documentation and Information 16.6
CENTRE FOR AGRICULTURAL DOCUMENTATION AND INFORMATION 16.1
Centre for Information on Language Teaching and Research 2.7
Centre for Mass Communication Research 1.18
Centre national de documentation agricole 44.1
CENTRE NATIONAL DE DOCUMENTATION SCIENTIFIQUE AND TECHNIQUE 38.1
Centre national de la recherche scientifique 2.13, 14.1, 14.2, 14.3, 14.7, 14.10, 14.11
Centre of African Studies 2.13
Centre suisse de coordination pour la recherche en matiere d'education 42.2
CENTRO DE INVESTIGACION DE RECURSOS CIENTIFICOS Y TECNOLOGICOS 30.1
Centro Internacional de Estudios Superiores de Comunicacion para America Latina 1.4
CENTRO NACIONAL DE DOCUMENTACION CIENTIFICA Y TECNOLOGICA 6.1
Centro svizzero di coordinazione della ricerca educazionale 42.2
Centrum Informacji Naukowej, Technicznej i Ekonomicznej 36.1
Cologne University 2.3
Colombian Fund for Scientific Research and Special Projects "Francisco Jose de Caldas" 10.1
Comite europeen pour les problemes criminels 2.8
Commission canadienne pour l'Unesco 9.2
Commission de coordination de la documentation administrative 14.2
Commission for Coordination of Administrative Documentation 14.2
Commission of the European Communities 2.11, 2.12, 14.12, 31.1, 31.5, 48.7
Commission on Thermodynamics 1.1
Committee for Economic Research 48.3
Committee for Science, Technical Progress and Higher Education 8.1
Committee to Coordinate Toxicology and Related Projects 49.18
Commonwealth Scientific and Industrial Research Organization 3.3
COMPENDIUM OF CURRENT ENVIRONMENTAL STUDIES IN PUGET SOUND AND NORTHWEST ESTUARINE WATERS 2.4
Comptroller General of the Republic 34.1
Computerized Information Unit 1.7, 1.8
COMPUTERS AND LAW DEPARTMENT 14.1
Conference europeenne des ministres des transports 1.9
Conseil de l'Europe 2.6, 2.7, 2.8, 2.15, 14.7, 16.1, 31.4, 42.2
Conseil de la radiodiffusion et des telecommunications canadiennes 9.2

Organization and System Names

Conseil des arts du Canada 9.2
Conseil national de recherches du Canada 9.4
Conseil nationale de la recherche scientifique 27.1
CONSEJO LATINOAMERICANO DE ESCUELAS DE ADMINISTRACION 2.9
Consejo Nacional de Ciencia y Tecnologia 1.7, 1.8, 30.1
Consejo Nacional de Investigaciones Cientificas y Tecnologicas 11.1, 50.1
Conselho de Pesquisas 7.3
Conselho Nacional de Desenvolvimento Cientifico e Tecnologico 7.2
Conservatoire national des arts et metiers 1.15
CONSIGLIO NAZIONALE DELLE RICERCHE 23.1
Consultative Group on International Agricultural Research 1.2
CONTRACTUAL SOCIAL SCIENCES ONGOING RESEARCH INFORMATION SYSTEM 14.2
Contraloria General de la Republica 34.1
COOPERATION INTERNATIONALE EN MATIERE DE DOCUMENTATION SUR L'ECONOMIE DES TRANSPORTS 1.9
Cooperative State Research Service 49.2
Coordenacao dos Programas do Plano Basico 7.2
COORDINATIEGROEP INFORMATIESYSTEMEN LOPEND ONDERZOEK 31.2
Coordination for Programs of the Basic Plan 7.2
COORDINATION GROUP FOR ONGOING RESEARCH INFORMATION SYSTEMS 31.2
COSTA RICAN ONGOING RESEARCH INFORMATION SYSTEM 11.1
Council for Mutual Economic Assistance 1.17
Council for Scientific and Industrial Research 17.1
Council of Europe 2.6, 2.7, 2.8, 2.15, 14.7, 16.1, 31.4, 42.2
Council of Scientific and Industrial Research 19.2
Council of the Association for Research in Yugoslavia 51.1
Countryside Commission (England and Wales) 48.4
COUNTRYSIDE COMMISSION RESEARCH REGISTER 48.4
Countryside Recreation Research Advisory Group 48.4
Coventry Corporation 48.12
CURRENT AGRICULTURAL RESEARCH INFORMATION SYSTEM 1.2, 7.1, 14.12, 19.1, 21.2, 35.1, 38.1, 44.1
CURRENT BUILDING RESEARCH PROJECTS 41.1
CURRENT CANCER RESEARCH PROJECT ANALYSIS CENTER 1.3
CURRENT PROJECTS/SCIENTIFIC PUBLICATIONS 41.2
CURRENT R & D IN ISRAEL 22.1
CURRENT RESEARCH IN THE NETHERLANDS 31.3
CURRENT RESEARCH INFORMATION IN SCIENCE AND TECHNOLOGY 35.2
CURRENT RESEARCH INFORMATION SERVICE 14.3
CURRENT RESEARCH INFORMATION SYSTEM 49.2
DAFTAR-E TAMARKOZ VA HAMAHANGI TAHGHIGHAT-E KESHAVARZI 21.2
DANISH RESEARCH ADMINISTRATION 12.1
Danish Social Science Research Council 12.1
DATA BANK FOR ENVIRONMENTAL RESEARCH 16.2
DATA BANK ON RESEARCH IN THE FIELD OF THE ENVIRONMENT 14.4
DATENBANK FUER FOERDERUNGSVORHABEN 16.5
Defense Documentation Center 49.16
Defense Logistics Agency 49.16

Delegation generale a la recherche scientifique et technique 14.2, 14.9, 38.1
Delegationen for energiforskning 41.5
DENTAL RESEARCH DATA OFFICER 49.3
Departamento de Politica Cientifica y Tecnologica 34.1
Departement des etudes et recherches appliquees aux enseignement generaux et a la vie scolaire 14.7
Departement des relations exterieures et de l'information 14.3
Departemento de Informacion y Documentacion 11.1
Department of Computational Linguistics 2.10
Department of Education and Science 2.7, 31.4, 48.10, 48.13, 48.16, 48.22
Department of Education, Northern Ireland 48.21
Department of External Relations and Information 14.3
Department of Health and Social Security 48.6, 48.9
Department of Industrial Promotion 43.2
Department of Industry 48.15, 48.17
Department of Information and Documentation 11.1
Department of Road Traffic 42.3
Department of Science and Technology 19.2
Department of Scientific and Technical Policy 34.1
Department of Studies and Research Applied to General Education and to School Life 14.7
Department of the Environment 1.19, 48.7
Department of Transport 1.19, 3.2, 3.4, 48.7
Deutsche Gesellschaft fuer Dokumentation e. V. 16.4
Deutsche Stiftung fuer internationale Entwicklung 16.6
Deutsches Krebsforschungszentrum 1.22
Development Centre 1.12, 48.5
DEVELOPMENT STUDIES: REGISTER OF RESEARCH IN THE UNITED KINGDOM 48.5
DHSS-SPONSORED RESEARCH 48.6
Diensten van de Eerste Minister 5.1
DIENSTEN VOOR PROGRAMMATIE VAN HET WETENSCHAPSBELEID 5.1
DIRECCION DE ESTADISTICA Y CENSO 34.1
Direccion de Informacion 30.1
Direccion de Planificacion Economica y Social 34.1
Direccion General de Planificacion 50.1
Direction des affairs juridiques 2.8
Direction des etudes et recherches 14.5
Direction generale de l'enseignement superieur 9.5
Directorate of Legal Affairs 2.8
Directorate-General for Agriculture, Division-Coordination of Agricultural Research 2.11
Directorate-General for Science Policy 31.2
Directorate-General for Scientific and Technical Information and Information Management 2.11, 2.12
Division de la bibliotheque et des systemes de documentation 1.2
Division des problemes criminels 2.8
Division of Crime Problems 2.8
DIVISION OF RESEARCH REGISTRATION 43.1
Division of the General Information Programme 1.13, 1.21
DOCUMENTATION CENTER 1.4
DOCUMENTATION CENTER OF THE FEDERAL INSTITUTE FOR ROAD TRANSPORT 2.5
DOCUMENTATION CENTRE 14.5

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Documentation Centre for Education in Europe 2.6
Documentation Centre for Human Sciences 14.1, 14.2, 14.3, 14.7, 14.10
Documentation Centre for Information Science 16.4
DOCUMENTATION CENTRE ON URBANISM 14.6
DOCUMENTATION INTERNATIONALE DE RECHERCHE ROUTIERE 1.16
DOCUMENTATION ON ONGOING RESEARCH PROJECTS ON OCCUPATIONAL SAFETY AND HEALTH 16.3
DOE/DTp REGISTER OF RESEARCH 48.7
DOKUMENTATION DER BUNDESANSTALT FUER STRASSENWESEN 2.5
DOKUMENTATIONSSTELLE FUER STRASSENBAU UND VERKEHRSTECHNIK 4.1
Dokumentationszentrum fuer Informationswissenschaften 16.4
Dowlat-e Iran 21.3
East African Agriculture and Forestry Research Organization 2.14
East African Community 2.14
East African Veterinary Research Organization 2.14
ECHANGE INTERNATIONAL D'INFORMATIONS SUR LES PROJETS DE RECHERCHES CRIMINOLOGIQUES DANS LES ETATS MEMBRES 2.8
Ecole des hautes etudes en sciences sociales 2.13
Economic and Social Planning Directorate 34.1
Economic and Social Sciences Department 2.3
EDUCATIONAL RESEARCH PROJECT REGISTRATION 31.4
EDUCATIONAL RESEARCH: A REGISTER OF CURRENT EDUCATIONAL RESEARCH PROJECTS SUPPORTED BY THE SCOTTISH EDUCATION DEPARTMENT 48.8
Eidgenoessisches Amt fuer Umweltschutz 42.1
Eidgenoessisches Departement des Innern 42.1, 42.2
Eidgenoessisches Justiz- und Polizeidepartement 42.3
Electric Power Research Institute 49.15
Electricite de France 14.5, 49.15
Empresa Brasileira de Assistencia Tecnica e Extensao Rural 7.1
ENERGY R&D INVENTORY 49.4, 49.6
Energy Research and Development Commission 41.5
ENERGY RESEARCH INFORMATION SYSTEM 49.5
ENTWICKLUNGSLAENDER-STUDIEN: BIBLIOGRAPHIE DER DEUTSCHEN ENTWICKLUNGSLAENDER-FORSCHUNG 16.6
ENVIRONMENTAL RESEARCH IN SWITZERLAND 42.1
ENVIRONMENTAL RESEARCH IN THE NETHERLANDS 31.5
Environmental Values Information System 41.4
Europaeische Konferenz der Verkehrsminister 2.5
European Committee on Crime Problems 2.8
European Communities 2.11, 2.12, 48.1
European Conference of Ministers of Transport 1.9, 2.5
European Documentation and Information System for Education 14.7, 31.4, 42.2
EUROPEAN DOCUMENTATION AND INFORMATION SYSTEM FOR EDUCATION 2.6, 14.7
EUROPEAN RESEARCH INFORMATION SERVICE ON MODERN LANGUAGES 2.7
Experimentation and Information Service 14.12
Facultad de Administracion 2.9
Federal Bureau of Statistics 42.4
Federal Chamber of Commerce 1.11

Federal Department of Communications 9.2
Federal Department of Justice and Police 42.3
Federal Department of the Interior 42.1, 42.2
Federal Environmental Agency 16.2
Federal Highway Administration 1.24
Federal Institute for Occupational Safety and Accident Research 16.3
Federal Institute for Road Transport 2.5
FEDERAL INVENTORY OF ENERGY RELATED BIOMEDICAL AND ENVIRONMENTAL RESEARCH 49.6
Federal Ministry for Construction and Technology 4.1
Federal Ministry for Research and Technology 2.3, 2.18, 16.4, 16.5
Federal Ministry for Traffic 2.5
Federal Ministry of Building and Engineering 1.11
Federal Ministry of Food, Agriculture and Forestry 16.1
Federal Ministry of Labour and Social Affairs 16.3
Federal Ministry of the Interior 16.2
Federal Office of Environmental Protection 42.1
Federal Research Institute Arsenal 4.1
Federal University of Minas Gerais 7.3
Federation internationale de documentation 1.5, 1.13, 16.4, 48.18
Fichier central des theses 2.13, 14.10
FID RESEARCH REFERRAL SERVICE 1.5
FOLLOW-UP SYSTEM FOR PROJECTS OF THE BASIC PLAN 7.2
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